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CA INDEXING COPYRIGHT (C) 2009 AMERICAN CHEMICAL SOCIETY (ACS)

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=> s cellulose (s) enzyme  
L1 50698 CELLULOSE (S) ENZYME

=> s l1 and glucan  
L2 3057 L1 AND GLUCAN

=> s l2 and (cellulase or frutofuranosidase)  
L3 1684 L2 AND (CELLULASE OR FRUTOFURANOSIDASE)

=> s l3 and synthesis  
L4 622 L3 AND SYNTHESIS

=> s l4 and oligo?  
18 FILES SEARCHED...  
L5 522 L4 AND OLIGO?

=> s l5 and (non-reducing(a)end)  
20 FILES SEARCHED...  
L6 106 L5 AND (NON-REDUCING(A) END)

=> s l6 and (Glc or Gal)  
L7 31 L6 AND (GLC OR GAL)

=> dis l7 1-31 bib abs

L7 ANSWER 1 OF 31 USPATFULL on STN  
AN 2008:334431 USPATFULL <<LOGINID::20090326>>

TI Alkaliphilic Bacillus Species alpha-Amylase Variants, Compositions  
Comprising alpha-Amylase Variants, And Methods of Use  
IN Jones, Brian E., Liedschendam, NETHERLANDS  
Vroemen, Casper, Oegstgeest, NETHERLANDS  
Chang, Claudine, Mountain View, CA, UNITED STATES  
Naab, Corey, North Chili, NY, UNITED STATES  
De Nobel, Hans, Heemstede, NETHERLANDS  
Kolkman, Marc, Oegstgeest, NETHERLANDS  
Weyler, Walter, San Francisco, CA, UNITED STATES  
PI US 20080293607 A1 20081127  
AI US 2008-41917 A1 20080304 (12)  
PRAI US 2007-905811P 20070309 (60)  
DT Utility  
FS APPLICATION  
LREP GENENCOR INTERNATIONAL, INC., 925 PAGE MILL ROAD, PALO ALTO, CA,  
94304-1013, US  
CLMN Number of Claims: 55  
ECL Exemplary Claim: 1  
DRWN 6 Drawing Page(s)  
LN.CNT 4171  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
AB Disclosed are variants of the  $\alpha$ -amylase derived from Bacillus sp.  
number 707, compositions comprising said variants, compositions comprising  
the variants, and methods of using the variants. The methods of use  
include methods of cleaning surfaces, laundering textiles, desizing,  
hydrolyzing biofilms off various substrates, and treating starch (e.g.,  
liquefaction and saccharification).

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 2 OF 31 USPATFULL on STN  
AN 2008:333939 USPATFULL <<LOGINID::20090326>>  
TI PLANT WALL DEGRADATIVE COMPOUNDS AND SYSTEMS  
IN Taylor, Larry Edmund, Lakewood, CO, UNITED STATES  
Weiner, Ronald M., Potomac, MD, UNITED STATES  
Hutcheson, Steven Wayne, Columbia, MD, UNITED STATES  
Ekborg, Nathan A., Beverly, MA, UNITED STATES  
Howard, Michael, Annapolis, MD, UNITED STATES  
PI US 20080293115 A1 20081127  
AI US 2008-99653 A1 20080408 (12)  
RLI Division of Ser. No. US 2005-121154, filed on 4 May 2005, Pat. No. US  
7365180  
PRAI US 2004-567971P 20040504 (60)  
DT Utility  
FS APPLICATION  
LREP MINTZ, LEVIN, COHN, FERRIS, GLOVSKY AND POPEO, P.C, ATTN: PATENT INTAKE  
CUSTOMER NO. 30623, ONE FINANCIAL CENTER, BOSTON, MA, 02111, US  
CLMN Number of Claims: 15  
ECL Exemplary Claim: 1-31  
DRWN 12 Drawing Page(s)  
LN.CNT 1050  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
AB The present invention relates to cell wall degradative systems, in  
particular to systems containing enzymes that bind to and/or  
depolymerize cellulose. These systems have a number of  
applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 3 OF 31 USPATFULL on STN  
AN 2008:333572 USPATFULL <<LOGINID::20090326>>

TI MODIFIED AMYLASE FROM PSEUDOMONAS SACCHAROPHILIA  
 IN Berg, Casper Tune, Vedbaek, DENMARK  
 Derkx, Patrick Maria Franciscus, Tikob, DENMARK  
 Fiorese, Carol, Redwood City, CA, UNITED STATES  
 Gerritse, Gijsbert, Heerjansdam, NETHERLANDS  
 Kellet-Smith, Anja Hemmingen, Copenhagen, DENMARK  
 Kragh, Karsten Matthias, Viby J, DENMARK  
 Liu, Wei, Palo Alto, CA, UNITED STATES  
 Shaw, Andrew, San Francisco, CA, UNITED STATES  
 Sorensen, Bo Spange, Skanderborg, DENMARK  
 Thoudahl, Charlotte Refdahl, Greve, DENMARK  
 PI US 20080292747 A1 20081127  
 AI US 2008-970473 A1 20080107 (11)  
 RLI Continuation-in-part of Ser. No. WO 2006-GB2513, filed on 7 Jul 2006,  
 PENDING  
 PRAI US 2005-697302P 20050707 (60)  
 DT Utility  
 FS APPLICATION  
 LREP FROMMER LAWRENCE & HAUG, 745 FIFTH AVENUE- 10TH FL., NEW YORK, NY,  
 10151, US  
 CLMN Number of Claims: 58  
 ECL Exemplary Claim: 1  
 DRWN 4 Drawing Page(s)  
 LN.CNT 4954  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 AB Described is a PS4 variant polypeptide derivable from a polypeptide  
 having amylase activity selected from: (a) a polypeptide comprising an  
 amino acid mutation at each of positions 33, 34, 121, 134, 141, 146,  
 157, 161, 178, 179, 223, 229, 272, 303, 307, 309 and 334; (b) a  
 polypeptide comprising an amino acid mutation at each of positions 33,  
 34, 121, 134, 141, 145, 146, 157, 178, 179, 223, 229, 272, 303, 307 and  
 334; (c) a polypeptide comprising an amino acid mutation at each of  
 positions 33, 34, 121, 134, 141, 146, 157, 178, 179, 223, 229, 272, 303,  
 307, 309 and 334; and (d) a polypeptide comprising an amino acid  
 mutation at each of positions 3, 33, 34, 70, 121, 134, 141, 146, 157,  
 178, 179, 223, 229, 272, 303, 307, 309 and 334; referring to the  
 numbering of a Pseudomonas saccharophilia exoamylase shown as SEQ ID NO:  
 1.  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 L7 ANSWER 4 OF 31 USPATFULL on STN  
 AN 2008:329069 USPATFULL <<LOGINID::20090326>>  
 TI Polypeptides having endoglucanase activity and polynucleotides encoding  
 same  
 IN Harris, Paul, Carnation, WA, UNITED STATES  
 Lopez de Leon, Alfredo, Davis, CA, UNITED STATES  
 Rey, Michael, Davis, CA, UNITED STATES  
 Ding, Hanshu, Davis, CA, UNITED STATES  
 Vlasenko, Elena, Davis, CA, UNITED STATES  
 PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
 PI US 20080289067 A1 20081120  
 AI US 2006-413022 A1 20060427 (11)  
 PRAI US 2005-675601P 20050427 (60)  
 DT Utility  
 FS APPLICATION  
 LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
 CLMN Number of Claims: 52  
 ECL Exemplary Claim: 1  
 DRWN 9 Drawing Page(s)  
 LN.CNT 2816

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having endoglucanase activity and isolated polynucleotides encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the polynucleotides as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 5 OF 31 USPATFULL on STN  
AN 2008:319494 USPATFULL <<LOGINID::20090326>>  
TI Polypeptides Having Endoglucanase Activity and Polynucleotides Encoding Same  
IN Johansen, Katja Salomon, Gentofte, DENMARK  
Gibson, Keith, Bagsvaerd, DENMARK  
Nielsen, Preben, Hoersholm, DENMARK  
Outtrup, Helle, Vaerloese, DENMARK  
PI US 20080280325 A1 20081113  
AI US 2006-90400 A1 20061115 (12)  
WO 2006-EP68509 20061115  
20080416 PCT 371 date  
PRAI DK 2005-1599 20051116  
US 2005-738430P 20051121 (60)  
DT Utility  
FS APPLICATION  
LREP NOVOZYMES NORTH AMERICA, INC., 500 FIFTH AVENUE, SUITE 1600, NEW YORK, NY, 10110, US  
CLMN Number of Claims: 16  
ECL Exemplary Claim: 1-20  
DRWN 8 Drawing Page(s)  
LN.CNT 2223

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having endoglucanase activity and isolated polynucleotides encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the polynucleotides as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 6 OF 31 USPATFULL on STN  
AN 2008:260532 USPATFULL <<LOGINID::20090326>>  
TI Polypeptide  
IN BERG, Casper Tune, Vedbak, DENMARK  
Derkx, Patrick Maria Franciscus, Tikob, DENMARK  
Fioresi, Carol, Redwood City, CA, UNITED STATES  
Gerritse, Gijsbert, Heerjansdam, NETHERLANDS  
Kellet-Smith, Anja Hemmingen, Copenhagen, DENMARK  
Kragh, Karsten Matthias, Viby J, DENMARK  
Liu, Wei, Palo Alto, CA, UNITED STATES  
Shaw, Andrew, San Francisco, CA, UNITED STATES  
Sorensen, Bo Spange, Skanderborg, DENMARK  
Thoudahl, Charlotte Refdahl, Greve, DENMARK  
PI US 20080227173 A1 20080918  
AI US 2006-534624 A1 20060922 (11)  
RLI Continuation-in-part of Ser. No. WO 2006-GB2513, filed on 7 Jul 2006, PENDING Continuation-in-part of Ser. No. US 2006-483220, filed on 7 Jul 2006, PENDING  
PRAI US 2005-697302P 20050707 (60)  
DT Utility  
FS APPLICATION

LREP FROMMER LAWRENCE & HAUG, 745 FIFTH AVENUE- 10TH FL., NEW YORK, NY,  
10151, US

CLMN Number of Claims: 27

ECL Exemplary Claim: 1

DRWN 4 Drawing Page(s)

LN.CNT 5142

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention describes a PS4 variant polypeptide derivable from a parent polypeptide having amylase activity selected from the group consisting of: (a) a polypeptide comprising an amino acid mutation at each of positions 33, 34, 121, 134, 141, 146, 157, 161, 178, 179, 223, 229, 272, 303, 307, 309 and 334; (b) a polypeptide comprising an amino acid mutation at each of positions 33, 34, 121, 134, 141, 145, 146, 157, 178, 179, 223, 229, 272, 303, 307 and 334; (c) a polypeptide comprising an amino acid mutation at each of positions 33, 34, 121, 134, 141, 146, 157, 178, 179, 223, 229, 272, 303, 307, 309 and 334; and (d) a polypeptide comprising an amino acid mutation at each of positions 3, 33, 34, 70, 121, 134, 141, 146, 157, 178, 179, 223, 229, 272, 303, 307, 309 and 334; with reference to the position numbering of a Pseudomonas saccharophila exoamylase sequence shown as SEQ ID NO: 1, uses of such a polypeptide as a food or feed additive, and nucleic acids encoding such.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 7 OF 31 USPATFULL on STN

AN 2008:245870 USPATFULL <<LOGINID::20090326>>

TI Polypeptides Having Cellobiohydrolase II Activity And Polynucleotides  
Encoding Same

IN Wu, Wenping, Beijing, CHINA

Lange, Lene, Valby, DENMARK

Skovlund, Dominique Aubert, Copehnagen N, DENMARK

Liu, Ye, Beijing, CHINA

PA Novozymes A/S, Bagsvaerd, DENMARK (non-U.S. corporation)

PI US 20080213835 A1 20080904

AI US 2007-958527 A1 20071218 (11)

RLI Division of Ser. No. US 2005-540091, filed on 20 Jun 2005, Pat. No. US  
7348168 A 371 of International Ser. No. WO 2003-DK914, filed on 19 Dec  
2003

PRAI US 2002-435100P 20021220 (60)

DT Utility

FS APPLICATION

LREP NOVOZYMES NORTH AMERICA, INC., 500 FIFTH AVENUE, SUITE 1600, NEW YORK,  
NY, 10110, US

CLMN Number of Claims: 12

ECL Exemplary Claim: 1-22

DRWN No Drawings

LN.CNT 3847

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to polypeptides having cellobiohydrolase II activity and polynucleotides having a nucleotide sequence which encodes for the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the nucleic acid constructs as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 8 OF 31 USPATFULL on STN

AN 2008:39013 USPATFULL <<LOGINID::20090326>>

TI Annotated Plant Genes

IN Cheikh, Nordine, 16534 Baxter Forest Ridge, Chesterfield, MO, UNITED  
STATES 63005

Liu, Jingdong, 2200 Sycamore Drive, Chesterfield, MO, UNITED STATES  
63017

PI US 20080034453 A1 20080207

AI US 1999-371146 A1 19990809 (9)

RLI Continuation-in-part of Ser. No. US 1999-9304517, filed on 6 May 1999,  
abandoned

DT Utility

FS APPLICATION

LREP ARNOLD & PORTER, LLP, 555 TWELFTH STREET, N.W., ATTN: IP DOCKETING,  
WASHINGTON, DC, 20004, UNITED STATES

CLMN Number of Claims: 10

ECL Exemplary Claim: 1

DRWN No Drawings

LN.CNT 16595

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention is in the field of plant biochemistry. More specifically the invention relates to nucleic acid sequences from plant cells, in particular, nucleic acid sequences from maize and soybean. The invention encompasses nucleic acid molecules that encode proteins and fragments of proteins. In addition, the invention also encompasses proteins and fragments of proteins so encoded and antibodies capable of binding these proteins or fragments. The invention also relates to methods of using the nucleic acid molecules, proteins and fragments of proteins, and antibodies, for example for genome mapping, gene identification and analysis, plant breeding, preparation of constructs for use in plant gene expression, and transgenic plants.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 9 OF 31 USPATFULL on STN

AN 2008:4470 USPATFULL <<LOGINID::20090326>>

TI Polypeptides having cellulolytic enhancing activity and polynucleotides encoding same

IN Dotson, William D., Plainsboro, NJ, UNITED STATES

Greenier, Jennifer, Vacaville, CA, UNITED STATES

Ding, Hanshu, Davis, CA, UNITED STATES

PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)

PI US 20080003645 A1 20080103

AI US 2007-835872 A1 20070808 (11)

RLI Continuation of Ser. No. US 2005-51670, filed on 4 Feb 2005, GRANTED,  
Pat. No. US 7271244

PRAI US 2004-542614P 20040206 (60)

DT Utility

FS APPLICATION

LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US

CLMN Number of Claims: 22

ECL Exemplary Claim: 1

DRWN 5 Drawing Page(s)

LN.CNT 3646

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having cellulolytic enhancing activity and isolated nucleic acids encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the nucleic acids as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 10 OF 31 USPATFULL on STN

AN 2007:335033 USPATFULL <<LOGINID::20090326>>

TI Enzyme systems for saccharification of plant cell wall polysaccharides

IN Weiner, Ronald M., Potomac, MD, UNITED STATES  
Hutcheson, Steven Wayne, Columbia, MD, UNITED STATES  
PI US 20070292929 A1 20071220  
AI US 2006-519104 A1 20060912 (11)  
RLI Continuation-in-part of Ser. No. US 2005-121154, filed on 4 May 2005,  
PENDING  
PRAI US 2004-567971P 20040504 (60)  
DT Utility  
FS APPLICATION  
LREP ARENT FOX LLP, 1050 CONNECTICUT AVENUE, N.W., SUITE 400, WASHINGTON, DC,  
20036, US  
CLMN Number of Claims: 20  
ECL Exemplary Claim: 1  
DRWN 11 Drawing Page(s)  
LN.CNT 1244

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to cell wall degradative systems, in particular to systems containing enzymes that bind to and/or depolymerize cellulose. These systems have a number of applications. Some embodiments relate to a method of producing ethanol using the cell wall degradative systems of the present invention.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 11 OF 31 USPATFULL on STN  
AN 2007:162139 USPATFULL <<LOGINID::20090326>>  
TI Polypeptide  
IN Berg, Casper Tune, Vedbek, DENMARK  
Derkx, Patrick Maria Franciscus, Tikob, DENMARK  
Fioresi, Carol, Redwood City, CA, UNITED STATES  
Gerritse, Gijsbert, Heerjansdam, NETHERLANDS  
Kellet-Smith, Anja Hemmingen, Copenhagen, DENMARK  
Kragh, Karsten Matthias, Viby J, DENMARK  
Liu, Wei, Hayward, CA, UNITED STATES  
Shaw, Andrew, San Francisco, CA, UNITED STATES  
Sorensen, Bo Spange, Skanderborg, DENMARK  
Thoudahl, Charlotte Refdahl, Greve, DENMARK  
PI US 20070141693 A1 20070621  
AI US 2006-483220 A1 20060707 (11)  
PRAI US 2005-697302P 20050707 (60)  
DT Utility  
FS APPLICATION  
LREP FROMMER LAWRENCE & HAUG, 745 FIFTH AVENUE- 10TH FL., NEW YORK, NY,  
10151, US  
CLMN Number of Claims: 27  
ECL Exemplary Claim: 1  
DRWN 4 Drawing Page(s)  
LN.CNT 3998

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention provides for a PS4 variant polypeptide derivable from a parent polypeptide having amylase activity which may be selected from the group consisting of: (a) a polypeptide comprising an amino acid mutation at each of positions 33, 34, 121, 134, 141, 146, 157, 161, 178, 179, 223, 229, 272, 303, 307, 309 and 334; (b) a polypeptide comprising an amino acid mutation at each of positions 33, 34, 121, 134, 141, 145, 146, 157, 178, 179, 223, 229, 272, 303, 307 and 334; (c) a polypeptide comprising an amino acid mutation at each of positions 33, 34, 121, 134, 141, 146, 157, 178, 179, 223, 229, 272, 303, 307 and 334; and (d) a polypeptide comprising an amino acid mutation at each of positions 3, 33, 34, 70, 121, 134, 141, 146, 157, 178, 179, 223, 229, 272, 303, 307, 309 and 334; with reference to the position numbering of a Pseudomonas



saccharophilia exoamylase sequence shown as SEQ ID NO: 1, uses of such a polypeptide as a food or feed additive, and nucleic acids encoding such.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 12 OF 31 USPATFULL on STN  
AN 2007:120989 USPATFULL <<LOGINID::20090326>>  
TI Cyclodextrin affinity purification  
IN Villafranca, Joseph John, New Hope, PA, UNITED STATES  
Hakes, David James, Willow Grove, PA, UNITED STATES  
Johnson, Karl F., Hatboro, PA, UNITED STATES  
Willett, Walter Scott, Doylestown, PA, UNITED STATES  
Meyers, Chester A., Medford, NJ, UNITED STATES  
PI US 20070105192 A1 20070510  
AI US 2004-555123 A1 20040505 (10)  
WO 2004-US13841 20040505  
20060807 PCT 371 date  
PRAI US 2003-60468374 20030505  
DT Utility  
FS APPLICATION  
LREP MORGAN, LEWIS & BOCKIUS LLP (SF), 2 PALO ALTO SQUARE, 3000 El Camino  
Real, Suite 700, PALO ALTO, CA, 94306, US  
CLMN Number of Claims: 33  
ECL Exemplary Claim: 1  
DRWN 10 Drawing Page(s)  
LN.CNT 3259

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB A method of immobilizing a molecular species that include a starch-binding domain is provided. There also is provided a material upon which the molecular species is immobilized, and a material that is capable of immobilizing the species. The method includes binding the species to a solid support, e.g., membranes, chromatographic supports and the like. The immobilized species is optionally purified by the method of the invention. Alternatively, the immobilized species is use in another method, such as in a synthesis as a synthetic reagent, or to purify another species that has an affinity for the immobilized species. Exemplary immobilized molecular species include bioactive agents, and biomolecules.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 13 OF 31 USPATFULL on STN  
AN 2007:82804 USPATFULL <<LOGINID::20090326>>  
TI Polypeptide  
IN Kragh, Karsten Matthias, Viby, DENMARK  
Mulder, Harm, Copenhagen, DENMARK  
Petersen, Steffen, Aalborg, DENMARK  
Fomsgaard, Helle, Aalborg, DENMARK  
Veltman, Oene Robert, Aalborg, DENMARK  
PA Danisco A/S, Copenhagen, DENMARK (non-U.S. corporation)  
PI US 20070072270 A1 20070329  
AI US 2006-635511 A1 20061208 (11)  
RLI Division of Ser. No. US 2004-864874, filed on 10 Jun 2004, GRANTED, Pat.  
No. US 7166453  
PRAI GB 2003-13754 20030613  
US 2003-479505P 20030619 (60)  
DT Utility  
FS APPLICATION  
LREP STEPTOE & JOHNSON LLP, 1330 CONNECTICUT AVENUE, N.W., WASHINGTON, DC,  
20036, US  
CLMN Number of Claims: 23

ECL Exemplary Claim: 1

DRWN 3 Drawing Page(s)

LN.CNT 4234

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB We disclose a PS4 variant polypeptide derivable from a parent polypeptide, the parent polypeptide having non-maltogenic exoamylase activity, which PS4 variant polypeptide comprises one or more of the following substitutions: G69P, A141P, G223A, A268P, G313P, S399P and G400P, with reference to the position numbering of a Pseudomonas saccharophilia exoamylase sequence shown as SEQ ID NO: 1. Such PS4 variant polypeptides may be used as exo-amylases, particularly as non-maltogenic exoamylases. Combinations of such PS4 variant polypeptides together with Novamyl are disclosed.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 14 OF 31 USPATFULL on STN

AN 2006:125180 USPATFULL <<LOGINID::20090326>>

TI Plant wall degradative compounds and systems

IN Taylor, Larry Edmund, Palmyra, PA, UNITED STATES

Weiner, Ronald M., Potomac, MD, UNITED STATES

Hutcheson, Steven Wayne, Columbia, MD, UNITED STATES

Ekborg, Nathan A., Beverly, MA, UNITED STATES

Howard, Michael, Diamondhead, MS, UNITED STATES

PI US 20060105914 A1 20060518

US 7365180 B2 20080429

AI US 2005-121154 A1 20050504 (11)

PRAI US 2004-567971P 20040504 (60)

DT Utility

FS APPLICATION

LREP ARENT FOX PLLC, 1050 CONNECTICUT AVENUE, N.W., SUITE 400, WASHINGTON, DC, 20036, US

CLMN Number of Claims: 31

ECL Exemplary Claim: 1

DRWN 11 Drawing Page(s)

LN.CNT 1056

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to cell wall degradative systems, in particular to systems containing enzymes that bind to and/or depolymerize cellulose. These systems have a number of applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 15 OF 31 USPATFULL on STN

AN 2006:62342 USPATFULL <<LOGINID::20090326>>

TI Polypeptides having cellobiohydrolase II activity and polynucleotides encoding same

IN Wu, Wenping, Beijing, CHINA

Lange, Lene, Valby, DENMARK

Skovlund, Dominique Aubert, Copenhagen N, DENMARK

Liu, Ye, Beijing, CHINA

PA Novozymes A/S, Bagsvaerd, DENMARK (non-U.S. corporation)

PI US 20060053514 A1 20060309

US 7348168 B2 20080325

AI US 2003-540091 A1 20031219 (10)

WO 2003-DK914 20031219

20050620 PCT 371 date

PRAI US 2002-435100P 20021220 (60)

DT Utility

FS APPLICATION

LREP NOVOZYMES NORTH AMERICA, INC., 500 FIFTH AVENUE, SUITE 1600, NEW YORK,  
NY, 10110, US

CLMN Number of Claims: 13

ECL Exemplary Claim: 1-22

DRWN No Drawings

LN.CNT 3792

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to polypeptides having cellobiohydrolase  
II activity and polynucleotides having a nucleotide sequence which  
encodes for the polypeptides. The invention also relates to nucleic acid  
constructs, vectors, and host cells comprising the nucleic acid  
constructs as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 16 OF 31 USPATFULL on STN

AN 2006:5819 USPATFULL <<LOGINID::20090326>>

TI Polypeptides having cellulolytic enhancing activity and polynucleotides  
encoding same

IN Dotson, William D., Plainsboro, NJ, UNITED STATES

Greenier, Jennifer, Vacaville, CA, UNITED STATES

Ding, Hanshu, Davis, CA, UNITED STATES

PA Novozymes Biotech, Inc., Davis, CA, UNITED STATES, 95616 (U.S.  
corporation)

PI US 20060005279 A1 20060105

US 7271244 B2 20070918

AI US 2005-51670 A1 20050204 (11)

PRAI US 2004-542614P 20040206 (60)

DT Utility

FS APPLICATION

LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US

CLMN Number of Claims: 66

ECL Exemplary Claim: 1

DRWN 5 Drawing Page(s)

LN.CNT 3663

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having  
cellulolytic enhancing activity and isolated nucleic acids encoding the  
polypeptides. The invention also relates to nucleic acid constructs,  
vectors, and host cells comprising the nucleic acids as well as methods  
for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 17 OF 31 USPATFULL on STN

AN 2005:189443 USPATFULL <<LOGINID::20090326>>

TI Methods for degrading lignocellulosic materials

IN Vlasenko, Elena, Davis, CA, UNITED STATES

Cherry, Joel, Davis, CA, UNITED STATES

Xu, Feng, Davis, CA, UNITED STATES

PA Novozymes Biotech, Inc., Davis, CA, UNITED STATES (U.S. corporation)

PI US 20050164355 A1 20050728

US 7354743 B2 20080408

AI US 2005-36871 A1 20050114 (11)

PRAI US 2004-537452P 20040116 (60)

DT Utility

FS APPLICATION

LREP NOVOZYMES BIOTECH, INC., 1445 DREW AVE, DAVIS, CA, 95616, US

CLMN Number of Claims: 53

ECL Exemplary Claim: 1

DRWN 29 Drawing Page(s)

LN.CNT 3003

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to methods for degrading a lignocellulosic material, comprising: treating the lignocellulosic material with an effective amount of one or more cellulolytic enzymes in the presence of at least one surfactant selected from the group consisting of a secondary alcohol ethoxylate, fatty alcohol ethoxylate, nonylphenol ethoxylate, tridecyl ethoxylate, and polyoxyethylene ether, wherein the presence of the surfactant increases the degradation of lignocellulosic material compared to the absence of the surfactant. The present invention also relates to methods for producing an organic substance, comprising: (a) saccharifying a lignocellulosic material with an effective amount of one or more cellulolytic enzymes in the presence of at least one surfactant selected from the group consisting of a secondary alcohol ethoxylate, fatty alcohol ethoxylate, nonylphenol ethoxylate, tridecyl ethoxylate, and polyoxyethylene ether, wherein the presence of the surfactant increases the degradation of lignocellulosic material compared to the absence of the surfactant; (b) fermenting the saccharified lignocellulosic material of step (a) with one or more fermenting microorganisms; and (c) recovering the organic substance from the fermentation.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 18 OF 31 USPATFULL on STN

AN 2005:43663 USPATFULL <<LOGINID::20090326>>

TI Polypeptide

IN Kragh, Karsten Mathias, Viby, DENMARK

Mulder, Harm, Copenhagen, DENMARK

Petersen, Steffan, Aalborg, DENMARK

Fomsgaard, Helle, Aalborg, DENMARK

Veltman, Oene Robert, Aalborg, DENMARK

PI US 20050037391 A1 20050217

US 7166453 B2 20070123

AI US 2004-864874 A1 20040610 (10)

PRAI GB 2003-13754 20030613

US 2003-479505P 20030619 (60)

DT Utility

FS APPLICATION

LREP Harold H. Fox, Steptoe & Johnson LLP, Box USPTO, 1330 Connecticut Avenue, N.W., Washington, DC, 20036

CLMN Number of Claims: 60

ECL Exemplary Claim: 1

DRWN 6 Drawing Page(s)

LN.CNT 4409

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB We disclose a PS4 variant polypeptide derivable from a parent polypeptide, the parent polypeptide having non-maltogenic exoamylase activity, which PS4 variant polypeptide comprises one or more of the following substitutions: G69P, A141P, G223A, A268P, G313P, S399P and G400P, with reference to the position numbering of a Pseudomonas saccharophilia exoamylase sequence shown as SEQ ID NO: 1. Such PS4 variant polypeptides may be used as exo-amylases, particularly as non-maltogenic exoamylases.

Combinations of such PS4 variant polypeptides together with Novamyl are disclosed.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 19 OF 31 USPATFULL on STN

AN 2004:140285 USPATFULL <<LOGINID::20090326>>  
TI Glucan chain length domains  
IN Commuri, Padma, Ankeny, IA, UNITED STATES  
Keeling, Peter L., Ames, IA, UNITED STATES  
Ramirez, Nona, Ames, IA, UNITED STATES  
McKean, Angela, Ames, IA, UNITED STATES  
Gao, Zhong, Ames, IA, UNITED STATES  
Guan, Hanping, Ames, IA, UNITED STATES  
PI US 20040107461 A1 20040603  
AI US 2002-109048 A1 20020329 (10)  
PRAI US 2001-279720P 20010330 (60)  
DT Utility  
FS APPLICATION  
LREP NIXON & VENDERHYE P.C., 8th Floor, 1100 North Glebe Road, Arlington, VA,  
22201-4714  
CLMN Number of Claims: 53  
ECL Exemplary Claim: 1  
DRWN 22 Drawing Page(s)  
LN.CNT 12564

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to a method for changing the glucan chain lengths using fusion protein domains of various starch synthase enzymes in any starch or starch granule producing organism. The invention relates to identification of a GLucan ASSociation domain (herein after referred to as "GLASS" domain) of granule bound starch synthase (GBSS) used in combination with any other GLYcosyl TRansferase domain otherwise referred to as pfam00534-catalytic domain (herein after referred to as "GLYTR" domain) of one or more of any of the other starch synthase enzymes. The invention relates to identifying and using the new and surprising discovery that starch synthases are composed of at least two distinct functional domains herein after labeled as "GLASS" and "GLYTR". More specifically, this invention relates to the genetic constructs that encode the fusions of the above domains and to the plants transformed with said constructs. The method of invention can thus be used in particular to provide a modified profile of starch granule associated starch synthase (SS) enzymes and by which modified glucan chain lengths of amylopectin and hence, modified starches and or complexes will be generated. This can be done in any organism and more particularly any plant that stores or synthesizes starch in any of its parts, such as potato, sweet potato, cassaya, pea, taro, banana, yam and cereal crops such as rice, maize, wheat, barley, oats, and sorghum.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 20 OF 31 USPATFULL on STN  
AN 2001:36957 USPATFULL <<LOGINID::20090326>>  
TI Polypeptide with reduced respiratory allergenicity  
IN Olsen, Arne Agerlin, Virum, Denmark  
Hansen, Lars Bo, Herlev, Denmark  
Beck, Thomas Christian, Birker.o slashed.d, Denmark  
PA Novo Nordisk A/S, Bagsvaerd, Denmark (non-U.S. corporation)  
PI US 6201110 B1 20010313  
AI US 2000-610751 20000706 (9)  
RLI Continuation of Ser. No. US 1999-405311, filed on 20 Sep 1999, now patented, Pat. No. US 6114509 Continuation of Ser. No. US 1998-150891, filed on 10 Sep 1998, now patented, Pat. No. US 5981718 Continuation of Ser. No. US 1997-836293, filed on 12 May 1997, now patented, Pat. No. US 5856451 Continuation of Ser. No. WO 1994-DK9500497, filed on 7 Dec 1994  
PRAI DK 1994-1395 19941207  
DK 1994-1396 19941207

DK 1994-1397 19941207  
DK 1994-1398 19941207  
DK 1994-1399 19941207  
DK 1994-1400 19941207  
DK 1994-1401 19941207  
DT Utility  
FS Granted  
EXNAM Primary Examiner: Sayala, Chhaya D.  
LREP Lambiris, Esq., Elias J.  
CLMN Number of Claims: 14  
ECL Exemplary Claim: 1  
DRWN 5 Drawing Figure(s); 5 Drawing Page(s)  
LN.CNT 2239

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to modified polypeptides with reduced respiratory allergenicity comprising a parent polypeptide with a molecular weight from between 10 kDa and 100 kDa conjugated to a polymer with a molecular weight (M.sub.r) in the range of 1 kDa and 60 kDa. The modified polypeptide are produced using a process including the step of conjugating from 1 to 30 polymer molecules with the parent polypeptide. Further the invention relates to compositions comprising said polypeptides and further ingredients normally used in e.g. detergents, including dishwashing detergents and soap bars, household article, agrochemicals, personal care products, cosmetics, toiletries, oral and dermal pharmaceuticals, composition for treating textiles, and compositions used for manufacturing food and feed. Finally the invention is directed to uses of polypeptides with reduced allergenicity or compositions thereof for reducing the allergenicity of products for a vast number of industrial applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 21 OF 31 USPATFULL on STN  
AN 2000:124776 USPATFULL <<LOGINID::20090326>>  
TI Endo-xyloglucan transferase  
IN Nishitani, Kazuhiko, Kagoshima, Japan  
Okazawa, Kazuhide, Otsu, Japan  
Asada, Kiyozo, Shiga-ken, Japan  
Kato, Ikunoshin, Uji, Japan  
PA Takara Shuzo Co., Ltd., Kyoto, Japan (non-U.S. corporation)  
PI US 6120998 20000919  
AI US 1998-52085 19980331 (9)  
RLI Division of Ser. No. US 1995-445533, filed on 22 May 1995, now patented, Pat. No. US 5840550 which is a division of Ser. No. US 1995-381280, filed on 31 Jan 1995, now patented, Pat. No. US 5516694 which is a continuation of Ser. No. US 1993-37281, filed on 26 Mar 1993, now abandoned which is a continuation-in-part of Ser. No. US 1992-929513, filed on 14 Aug 1992, now abandoned  
PRAI JP 1992-98506 19920326  
JP 1992-217489 19920724  
JP 1993-31163 19930128  
DT Utility  
FS Granted  
EXNAM Primary Examiner: Elliott, George C.; Assistant Examiner: Schmidt, Melissa  
LREP Wenderoth, Lind & Ponack, L.L.P.  
CLMN Number of Claims: 28  
ECL Exemplary Claim: 1  
DRWN 16 Drawing Figure(s); 16 Drawing Page(s)  
LN.CNT 2859  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB Endo-xyloglucan transferases responsible for growth of plant cell wall, genes coding for the enzymes, a method of transferring xyloglucan molecules by using the enzyme, and methods of using the gene are described.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 22 OF 31 USPATFULL on STN  
AN 2000:117890 USPATFULL <<LOGINID::20090326>>  
TI Polypeptide with reduced allergenicity  
IN Olsen, Arne Agerlin, Virum, Denmark  
Hansen, Lars Bo, Herlev, Denmark  
Beck, Thomas Christian, Birkerød, Denmark  
PA Novo Nordisk A/S, Bagsværd, Denmark (non-U.S. corporation)  
PI US 6114509 20000905  
AI US 1999-405311 19990920 (9)  
RLI Continuation of Ser. No. US 1998-150891, filed on 10 Sep 1998, now patented, Pat. No. US 5981718 which is a continuation of Ser. No. US 1997-836293, filed on 12 May 1997, now patented, Pat. No. US 5856451 which is a continuation of Ser. No. WO 1995-DK497, filed on 7 Dec 1995  
PRAI DK 1994-1395 19941207  
DK 1994-1396 19941207  
DK 1994-1397 19941207  
DK 1994-1398 19941207  
DK 1994-1399 19941207  
DK 1994-1400 19941207  
DK 1994-1401 19941207  
DT Utility  
FS Granted  
EXNAM Primary Examiner: Sayala, Chhaya D.  
LREP Zelson, Esq., Steve T., Green, Esq., Reza  
CLMN Number of Claims: 21  
ECL Exemplary Claim: 1  
DRWN 5 Drawing Figure(s); 5 Drawing Page(s)  
LN.CNT 2255

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to modified polypeptides with reduced allergenicity comprising a parent polypeptide with a molecular weight from between 10 kDa and 100 kDa conjugated to a polymer with a molecular weight (M.sub.r) in the range of 1 kDa and 60 kDa. The modified polypeptide are produced using a process including the step of conjugating from 1 to 30 polymer molecules with the parent polypeptide. Further the invention relates to compositions comprising said polypeptides and further ingredients normally used in e.g. detergents, including dishwashing detergents and soap bars, household article, agrochemicals, personal care products, cosmetics, toiletries, oral and dermal pharmaceuticals, composition for treating textiles, and compositions used for manufacturing food and feed. Finally the invention is directed to uses of polypeptides with reduced allergenicity or compositions thereof for reducing the allergenicity of products for a vast number of industrial applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 23 OF 31 USPATFULL on STN  
AN 1999:142125 USPATFULL <<LOGINID::20090326>>  
TI Polypeptide with reduced allergenicity  
IN Olsen, Arne Agerlin, Virum, Denmark  
Hansen, Lars Bo, Herlev, Denmark  
Beck, Thomas Christian, Birkerød, Denmark  
PA Novo Nordisk A/S, Bagsværd, Denmark (non-U.S. corporation)

PI US 5981718 19991109  
 AI US 1998-150891 19980910 (9)  
 RLI Continuation of Ser. No. US 1997-836293, filed on 12 May 1997, now  
 patented, Pat. No. US 5856451 which is a continuation of Ser. No. WO  
 1995-DK497, filed on 7 Dec 1995  
 PRAI DK 1994-1395 19941207  
 DK 1994-1396 19941207  
 DK 1994-1397 19941207  
 DK 1994-1398 19941207  
 DK 1994-1399 19941207  
 DK 1994-1400 19941207  
 DK 1994-1401 19941207  
 DT Utility  
 FS Granted  
 EXNAM Primary Examiner: Sayala, Chhaya D.  
 LREP Zelson, Esq., Steve T., Esq., Reza Green  
 CLMN Number of Claims: 12  
 ECL Exemplary Claim: 1  
 DRWN 5 Drawing Figure(s); 5 Drawing Page(s)  
 LN.CNT 2257

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to modified polypeptides with reduced  
 allergenicity comprising a parent polypeptide with a molecular weight  
 from between 10 kDa and 100 kDa conjugated to a polymer with a molecular  
 weight (M.sub.r) in the range of 1 kDa and 60 kDa. The modified  
 polypeptide are produced using a process including the step of  
 conjugating from 1 to 30 polymer molecules with the parent polypeptide.  
 Further the invention relates to compositions comprising said  
 polypeptides and further ingredients normally used in e.g. detergents,  
 including dishwashing detergents and soap bars, household article,  
 agrochemicals, personal care products, cosmetics, toiletries, oral and  
 dermal pharmaceuticals, composition for treating textiles, and  
 compositions used for manufacturing food and feed. Finally the invention  
 is directed to uses of polypeptides with reduced allergenicity or  
 compositions thereof for reducing the allergenicity of products for a  
 vast number of industrial applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 24 OF 31 USPATFULL on STN  
 AN 1999:1779 USPATFULL <<LOGINID::20090326>>  
 TI Method for reducing respiratory allergenicity  
 IN Olsen, Arne Agerlin, Virum, Denmark  
 Hansen, Lars Bo, Herlev, Denmark  
 Beck, Thomas Christian, Birker.o slashed.d, Denmark  
 PA Novo Nordisk A/S, Bagsvaerd, Denmark (non-U.S. corporation)  
 PI US 5856451 19990105  
 WO 9617929 19960613  
 AI US 1997-836293 19970512 (8)  
 WO 1995-DK497 19951207  
 19970512 PCT 371 date  
 19970512 PCT 102(e) date  
 PRAI DK 1994-1395 19941207  
 DK 1994-1396 19941207  
 DK 1994-1397 19941207  
 DK 1994-1398 19941207  
 DK 1994-1399 19941207  
 DK 1994-1400 19941207  
 DK 1994-1401 19941207  
 DT Utility  
 FS Granted



EXNAM Primary Examiner: Sayala, Chhaya D.  
LREP Zelson, Esq., Steve T., Agris, Esq., Cheryl H.  
CLMN Number of Claims: 37  
ECL Exemplary Claim: 1  
DRWN 5 Drawing Figure(s); 5 Drawing Page(s)  
LN.CNT 2323

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to modified polypeptides with reduced allergenicity comprising a parent polypeptide with a molecular weight from between 10 kDa and 100 kDa conjugated to a polymer with a molecular weight (M.sub.r) in the range of 1 kDa and 60 kDa. The modified polypeptide are produced using a process including the step of conjugating from 1 to 30 polymer molecules with the parent polypeptide. Further the invention relates to compositions comprising said polypeptides and further ingredients normally used in e.g. detergents, including dishwashing detergents and soap bars, household article, agrochemicals, personal care products, cosmetics, toiletries, oral and dermal pharmaceuticals, composition for treating textiles, and compositions used for manufacturing food and feed. Finally the invention is directed to uses of polypeptides with reduced allergenicity or compositions thereof for reducing the allergenicity of products for a vast number of industrial applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 25 OF 31 USPATFULL on STN  
AN 1998:147272 USPATFULL <<LOGINID::20090326>>  
TI Endo-xyloglucan transferase  
IN Nishitani, Kazuhiko, Kagoshima, Japan  
Okazawa, Kazuhide, Otsu, Japan  
Asada, Kiyozo, Shiga-ken, Japan  
Kato, Ikunoshin, Uji, Japan  
PA Takara Shuzo Co., Ltd., Kyoto-fu, Japan (non-U.S. corporation)  
PI US 5840550 19981124  
AI US 1995-445533 19950522 (8)  
RLI Division of Ser. No. US 1995-381280, filed on 31 Jan 1995, now patented, Pat. No. US 5516694 which is a continuation of Ser. No. US 1993-37281, filed on 26 Mar 1993, now abandoned which is a continuation-in-part of Ser. No. US 1992-929513, filed on 14 Aug 1992, now abandoned  
PRAI JP 1992-98506 19920326  
JP 1992-217489 19920724  
JP 1993-31163 19930128  
DT Utility  
FS Granted  
EXNAM Primary Examiner: Patterson, Jr., Charles L.; Assistant Examiner: Hobbs, Lisa J.  
LREP Wenderoth, Lind & Ponack  
CLMN Number of Claims: 6  
ECL Exemplary Claim: 1  
DRWN 17 Drawing Figure(s); 16 Drawing Page(s)  
LN.CNT 2941

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB Endo-xyloglucanase transferases responsible for growth of plant cell wall, genes coding for the enzymes, a method of transferring xyloglucan molecules by using the enzyme, and methods of using the gene are described.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 26 OF 31 USPATFULL on STN  
AN 96:41134 USPATFULL <<LOGINID::20090326>>

TI Endo-xyloglucan transferase  
IN Nishitani, Kazuhiko, Kagoshima, Japan  
Okazawa, Kazuhide, Otsu, Japan  
Asada, Kiyozo, Shiga, Japan  
Kato, Ikunoshin, Uji, Japan  
PA Takara Shuzo Co., Ltd., Kyoto, Japan (non-U.S. corporation)  
PI US 5516694 19960514  
AI US 1995-381280 19950131 (8)  
RLI Continuation of Ser. No. US 1993-37281, filed on 26 Mar 1993, now  
abandoned which is a continuation-in-part of Ser. No. US 1992-929513,  
filed on 14 Aug 1992, now abandoned  
PRAI JP 1992-98506 19920326  
JP 1992-217489 19920724  
JP 1993-31163 19930128  
DT Utility  
FS Granted  
EXNAM Primary Examiner: Low, Christopher S. F.  
LREP Wenderoth, Lind & Ponack  
CLMN Number of Claims: 16  
ECL Exemplary Claim: 1  
DRWN 17 Drawing Figure(s); 16 Drawing Page(s)  
LN.CNT 2746  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
AB Endo-xyloglucan transferases responsible for growth of plant cell wall,  
genes coding for the enzymes, a method of transferring xyloglucan  
molecules by using the enzyme, and methods of using the gene are  
described.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 27 OF 31 USPAT2 on STN  
AN 2006:125180 USPAT2 <<LOGINID::20090326>>  
TI Plant wall degradative compounds and systems  
IN Taylor, Larry Edmund, Lakewood, CO, UNITED STATES  
Weiner, Ronald M., Potomac, MD, UNITED STATES  
Hutcheson, Steven Wayne, Columbia, MD, UNITED STATES  
Ekborg, Nathan A., Beverly, MA, UNITED STATES  
Howard, Michael, Annapolis, MD, UNITED STATES  
PA University of Maryland, College Park, MD, UNITED STATES (U.S.  
corporation)  
PI US 7365180 B2 20080429  
AI US 2005-121154 20050504 (11)  
PRAI US 2004-567971P 20040504 (60)  
DT Utility  
FS GRANTED  
EXNAM Primary Examiner: Guzo, David; Assistant Examiner: Joiike, Michele K.  
LREP Arent Fox LLP  
CLMN Number of Claims: 3  
ECL Exemplary Claim: 1  
DRWN 13 Drawing Figure(s); 11 Drawing Page(s)  
LN.CNT 1092  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
AB The present invention relates to cell wall degradative systems, in  
particular to systems containing enzymes that bind to and/or  
depolymerize cellulose. These systems have a number of  
applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 28 OF 31 USPAT2 on STN  
AN 2006:62342 USPAT2 <<LOGINID::20090326>>

TI Polypeptides having cellobiohydrolase II activity and polynucleotides  
 encoding same  
 IN Wu, Wenping, Beijing, CHINA  
 Lange, Lene, Valby, DENMARK  
 Skovlund, Dominique Aubert, Copenhagen, DENMARK  
 Liu, Ye, Beijing, CHINA  
 PA Novozymes A/S, Bagsvaerd, DENMARK (non-U.S. corporation)  
 PI US 7348168 B2 20080325  
 WO 2004056981 20040708  
 AI US 2003-540091 20031219 (10)  
 WO 2003-DK914 20031219  
 20050620 PCT 371 date  
 PRAI US 2002-435100P 20021220 (60)  
 DT Utility  
 FS GRANTED  
 EXNAM Primary Examiner: Prouty, Rebecca E.; Assistant Examiner: Chowdhury,  
 Iqbal  
 LREP Lambiris, Elias  
 CLMN Number of Claims: 12  
 ECL Exemplary Claim: 1  
 DRWN No Drawings  
 LN.CNT 3584  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 AB The present invention relates to polypeptides having cellobiohydrolase  
 II activity and polynucleotides having a nucleotide sequence, which  
 encodes for the polypeptides. The invention also relates to nucleic acid  
 constructs, vectors, and host cells comprising the nucleic acid  
 constructs as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 29 OF 31 USPAT2 on STN  
 AN 2006:5819 USPAT2 <<LOGINID::20090326>>  
 TI Polypeptides having cellulolytic enhancing activity and polynucleotides  
 encoding same  
 IN Dotson, William D., Plainsboro, NJ, UNITED STATES  
 Greenier, Jennifer, Vacaville, CA, UNITED STATES  
 Ding, Hanshu, Davis, CA, UNITED STATES  
 PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
 PI US 7271244 B2 20070918  
 AI US 2005-51670 20050204 (11)  
 PRAI US 2004-542614P 20040206 (60)  
 DT Utility  
 FS GRANTED  
 EXNAM Primary Examiner: Rao, Manjunath  
 LREP Starnes, Robert L.  
 CLMN Number of Claims: 27  
 ECL Exemplary Claim: 1  
 DRWN 5 Drawing Figure(s); 5 Drawing Page(s)  
 LN.CNT 3640  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 AB The present invention relates to isolated polypeptides having  
 cellulolytic enhancing activity and isolated nucleic acids encoding the  
 polypeptides. The invention also relates to nucleic acid constructs,  
 vectors, and host cells comprising the nucleic acids as well as methods  
 for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 30 OF 31 USPAT2 on STN  
 AN 2005:189443 USPAT2 <<LOGINID::20090326>>

TI Methods for degrading lignocellulosic materials  
IN Vlasenko, Elena, Davis, CA, UNITED STATES  
Cherry, Joel, Davis, CA, UNITED STATES  
Xu, Feng, Davis, CA, UNITED STATES  
PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 7354743 B2 20080408  
AI US 2005-36871 20050114 (11)  
PRAI US 2004-537452P 20040116 (60)  
DT Utility  
FS GRANTED  
EXNAM Primary Examiner: Lilling, Herbert J.  
LREP Starnes, Robert L.  
CLMN Number of Claims: 13  
ECL Exemplary Claim: 1  
DRWN 29 Drawing Figure(s); 29 Drawing Page(s)  
LN.CNT 2914

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to methods for degrading a lignocellulosic material, comprising: treating the lignocellulosic material with an effective amount of one or more cellulolytic enzymes in the presence of at least one surfactant selected from the group consisting of a secondary alcohol ethoxylate, fatty alcohol ethoxylate, nonylphenol ethoxylate, tridecyl ethoxylate, and polyoxyethylene ether, wherein the presence of the surfactant increases the degradation of lignocellulosic material compared to the absence of the surfactant. The present invention also relates to methods for producing an organic substance, comprising: (a) saccharifying a lignocellulosic material with an effective amount of one or more cellulolytic enzymes in the presence of at least one surfactant selected from the group consisting of a secondary alcohol ethoxylate, fatty alcohol ethoxylate, nonylphenol ethoxylate, tridecyl ethoxylate, and polyoxyethylene ether, wherein the presence of the surfactant increases the degradation of lignocellulosic material compared to the absence of the surfactant; (b) fermenting the saccharified lignocellulosic material of step (a) with one or more fermentating microorganisms; and (c) recovering the organic substance from the fermentation.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L7 ANSWER 31 OF 31 USPAT2 on STN  
AN 2005:43663 USPAT2 <<LOGINID::20090326>>  
TI Polypeptide  
IN Kragh, Karsten Matthias, Viby, DENMARK  
Mulder, Harm, Copenhagen, DENMARK  
Petersen, Steffen, Aalborg, DENMARK  
Fomsgaard, Helle, Aalborg, DENMARK  
Veltman, Oene Robert, Aalborg, DENMARK  
PA Danisco A/S, Copenhagen, DENMARK (non-U.S. corporation)  
PI US 7166453 B2 20070123  
AI US 2004-864874 20040610 (10)  
PRAI GB 2003-13754 20030613  
US 2003-479505P 20030619 (60)  
DT Utility  
FS GRANTED  
EXNAM Primary Examiner: Prouty, Rebecca E.; Assistant Examiner: Meah, Mohammad  
LREP Steptoe & Johnson LLP  
CLMN Number of Claims: 24  
ECL Exemplary Claim: 1  
DRWN 3 Drawing Figure(s); 3 Drawing Page(s)  
LN.CNT 4250

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB We disclose a PS4 variant polypeptide derivable from a parent polypeptide, the parent polypeptide having non-maltogenic exoamylase activity, which PS4 variant polypeptide comprises one or more of the following substitutions: G69P, A141P, G223A, A268P, G313P, S399P and G400P, with reference to the position numbering of a Pseudomonas saccharophilia exoamylase sequence shown as SEQ ID NO: 1. Such PS4 variant polypeptides may be used as exo-amylases, particularly as non-maltogenic exoamylases. Combinations of such PS4 variant polypeptides together with Novamyl are disclosed.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

=> s 12 and cellulase

L8 1684 L2 AND CELLULASE

=> s 18 and oligosaccharides

L9 466 L8 AND OLIGOSACCHARIDES

=> s 19 and (non-reducing(a)end)

23 FILES SEARCHED...

L10 135 L9 AND (NON-REDUCING(A) END)

=> s 110 and (GLC and Gal)

L11 2 L10 AND (GLC AND GAL)

=> dis 111 1-2 bib abs

L11 ANSWER 1 OF 2 USPATFULL on STN

AN 2008:39013 USPATFULL <<LOGINID::20090326>>

TI Annotated Plant Genes

IN Cheikh, Nordine, 16534 Baxter Forest Ridge, Chesterfield, MO, UNITED STATES 63005

Liu, Jingdong, 2200 Sycamore Drive, Chesterfield, MO, UNITED STATES 63017

PI US 20080034453 A1 20080207

AI US 1999-371146 A1 19990809 (9)

RLI Continuation-in-part of Ser. No. US 1999-9304517, filed on 6 May 1999, abandoned

DT Utility

FS APPLICATION

LREP ARNOLD & PORTER, LLP, 555 TWELFTH STREET, N.W., ATTN: IP DOCKETING, WASHINGTON, DC, 20004, UNITED STATES

CLMN Number of Claims: 10

ECL Exemplary Claim: 1

DRWN No Drawings

LN.CNT 16595

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention is in the field of plant biochemistry. More specifically the invention relates to nucleic acid sequences from plant cells, in particular, nucleic acid sequences from maize and soybean. The invention encompasses nucleic acid molecules that encode proteins and fragments of proteins. In addition, the invention also encompasses proteins and fragments of proteins so encoded and antibodies capable of binding these proteins or fragments. The invention also relates to methods of using the nucleic acid molecules, proteins and fragments of proteins, and antibodies, for example for genome mapping, gene identification and analysis, plant breeding, preparation of constructs for use in plant gene expression, and transgenic plants.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L11 ANSWER 2 OF 2 USPATFULL on STN  
 AN 2007:120989 USPATFULL <<LOGINID::20090326>>  
 TI Cyclodextrin affinity purification  
 IN Villafranca, Joseph John, New Hope, PA, UNITED STATES  
 Hakes, David James, Willow Grove, PA, UNITED STATES  
 Johnson, Karl F., Hatboro, PA, UNITED STATES  
 Willett, Walter Scott, Doylestown, PA, UNITED STATES  
 Meyers, Chester A., Medford, NJ, UNITED STATES  
 PI US 20070105192 A1 20070510  
 AI US 2004-555123 A1 20040505 (10)  
 WO 2004-US13841 20040505  
 20060807 PCT 371 date  
 PRAI US 2003-60468374 20030505  
 DT Utility  
 FS APPLICATION  
 LREP MORGAN, LEWIS & BOCKIUS LLP (SF), 2 PALO ALTO SQUARE, 3000 El Camino  
 Real, Suite 700, PALO ALTO, CA, 94306, US  
 CLMN Number of Claims: 33  
 ECL Exemplary Claim: 1  
 DRWN 10 Drawing Page(s)  
 LN.CNT 3259  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 AB A method of immobilizing a molecular species that include a  
 starch-binding domain is provided. There also is provided a material  
 upon which the molecular species is immobilized, and a material that is  
 capable of immobilizing the species. The method includes binding the  
 species to a solid support, e.g., membranes, chromatographic supports  
 and the like. The immobilized species is optionally purified by the  
 method of the invention. Alternatively, the immobilized species is use  
 in another method, such as in a synthesis as a synthetic reagent, or to  
 purify another species that has an affinity for the immobilized species.  
 Exemplary immobilized molecular species include bioactive agents, and  
 biomolecules.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

=> s 110 and catalyst  
 L12 33 L10 AND CATALYST

=> dis 112 1-33 bib abs

L12 ANSWER 1 OF 33 USPATFULL on STN  
 AN 2009:20977 USPATFULL <<LOGINID::20090326>>  
 TI Polypeptides having cellulolytic enhancing activity and polynucleotides  
 encoding same  
 IN Lopez de Leon, Alfredo, Davis, CA, UNITED STATES  
 Ding, Hanshu, Davis, CA, UNITED STATES  
 Brown, Kimberly, Elk Grove, CA, UNITED STATES  
 PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
 PI US 20090019608 A1 20090115  
 AI US 2008-130722 A1 20080530 (12)  
 PRAI US 2007-941234P 20070531 (60)  
 DT Utility  
 FS APPLICATION  
 LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
 CLMN Number of Claims: 30  
 ECL Exemplary Claim: 1  
 DRWN 12 Drawing Page(s)  
 LN.CNT 6851

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having cellulolytic enhancing activity and isolated polynucleotides encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the polynucleotides as well as methods of producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 2 OF 33 USPATFULL on STN  
AN 2009:9046 USPATFULL <<LOGINID::20090326>>  
TI Affinity Foam Fractionation for Collection and Purification of Materials  
IN Ju, Lu-Kwang, Akron, OH, UNITED STATES  
Zhang, Qin, Akron, OH, UNITED STATES  
PA THE UNIVERSITY OF AKRON, Akron, OH, UNITED STATES (U.S. corporation)  
PI US 20090008325 A1 20090108  
AI US 2006-912306 A1 20060428 (11)  
WO 2006-US16325 20060428  
20080630 PCT 371 date  
PRAI US 2005-676232P 20050429 (60)  
DT Utility  
FS APPLICATION  
LREP ROETZEL AND ANDRESS, 222 SOUTH MAIN STREET, AKRON, OH, 44308, US  
CLMN Number of Claims: 19  
ECL Exemplary Claim: 1  
DRWN 9 Drawing Page(s)  
LN.CNT 995

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention generally relates to methods for purifying and/or concentrating compounds from or in solutions and/or mixtures. In one embodiment, the present invention relates to a method for purifying and/or concentrating a compound from a solution or mixture. In another embodiment, the present invention relates to a method for purifying/concentrating a compound from a solution or mixture that utilizes, in whole or part, foam purification and/or concentration. In still another embodiment, the present invention can be used to separate, concentrate and/or purify any material, including biological products and/or biomaterials, that can be selectively bound to a binding agent, thereby yielding a complex that will readily partition onto bubble surfaces in a foam.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 3 OF 33 USPATFULL on STN  
AN 2008:341247 USPATFULL <<LOGINID::20090326>>  
TI Compositions for degrading cellulosic material  
IN Merino, Sandra, West Sacramento, CA, UNITED STATES  
McFarland, Keith, Davis, CA, UNITED STATES  
Cherry, Joel, Davis, CA, UNITED STATES  
Teter, Sarah, Menlo Park, CA, UNITED STATES  
PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 20080299613 A1 20081204  
AI US 2008-130838 A1 20080530 (12)  
PRAI US 2007-941251P 20070531 (60)  
DT Utility  
FS APPLICATION  
LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
CLMN Number of Claims: 33  
ECL Exemplary Claim: 1  
DRWN 14 Drawing Page(s)  
LN.CNT 10157

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to cellulolytic compositions for degrading or converting cellulose-containing material and methods of producing and using the compositions.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 4 OF 33 USPATFULL on STN

AN 2008:334431 USPATFULL <<LOGINID::20090326>>

TI Alkaliphilic Bacillus Species alpha-Amylase Variants, Compositions  
Comprising alpha-Amylase Variants, And Methods of Use

IN Jones, Brian E., Liedschendam, NETHERLANDS  
Vroemen, Casper, Oegstgeest, NETHERLANDS  
Chang, Claudine, Mountain View, CA, UNITED STATES  
Naab, Corey, North Chili, NY, UNITED STATES  
De Nobel, Hans, Heemstede, NETHERLANDS  
Kolkman, Marc, Oegstgeest, NETHERLANDS  
Weyler, Walter, San Francisco, CA, UNITED STATES

PI US 20080293607 A1 20081127

AI US 2008-41917 A1 20080304 (12)

PRAI US 2007-905811P 20070309 (60)

DT Utility

FS APPLICATION

LREP GENENCOR INTERNATIONAL, INC., 925 PAGE MILL ROAD, PALO ALTO, CA,  
94304-1013, US

CLMN Number of Claims: 55

ECL Exemplary Claim: 1

DRWN 6 Drawing Page(s)

LN.CNT 4171

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB Disclosed are variants of the  $\alpha$ -amylase derived from Bacillus sp.  
number 707, compositions comprising said variants, compositions comprising  
the variants, and methods of using the variants. The methods of use  
include methods of cleaning surfaces, laundering textiles, desizing,  
hydrolyzing biofilms off various substrates, and treating starch (e.g.,  
liquefaction and saccharification).

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 5 OF 33 USPATFULL on STN

AN 2008:333933 USPATFULL <<LOGINID::20090326>>

TI Methods for degrading or converting plant cell wall polysaccharides

IN Berka, Randy, Davis, CA, UNITED STATES

Cherry, Joel, Davis, CA, UNITED STATES

PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)

PI US 20080293109 A1 20081127

AI US 2008-172852 A1 20080714 (12)

RLI Division of Ser. No. US 2005-78921, filed on 10 Mar 2005, Pat. No. US  
7413882

PRAI US 2004-556779P 20040325 (60)

DT Utility

FS APPLICATION

LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US

CLMN Number of Claims: 21

ECL Exemplary Claim: 1

DRWN 17 Drawing Page(s)

LN.CNT 3284

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to methods for converting plant cell wall  
polysaccharides into one or more products, comprising: treating the  
plant cell wall polysaccharides with an effective amount of a spent



whole fermentation broth of a recombinant microorganism, wherein the recombinant microorganism expresses one or more heterologous genes encoding enzymes which degrade or convert the plant cell wall polysaccharides into the one or more products. The present invention also relates to methods for producing an organic substance, comprising: (a) saccharifying plant cell wall polysaccharides with an effective amount of a spent whole fermentation broth of a recombinant microorganism, wherein the recombinant microorganism expresses one or more heterologous genes encoding enzymes which degrade or convert the plant cell wall polysaccharides into saccharified material; (b) fermenting the saccharified material of step (a) with one or more fermenting microorganisms; and (c) recovering the organic substance from the fermentation.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 6 OF 33 USPATFULL on STN  
AN 2008:238129 USPATFULL <<LOGINID::20090326>>  
TI Polypeptides having cellulolytic enhancing activity and nucleic acids encoding same  
IN Brown, Kimberly, Elk Grove, CA, UNITED STATES  
Harris, Paul, Carnation, WA, UNITED STATES  
Zaretsky, Elizabeth, Reno, NV, UNITED STATES  
Re, Edward, Davis, CA, UNITED STATES  
Vlasenko, Elena, Davis, CA, UNITED STATES  
McFarland, Keith, Davis, CA, UNITED STATES  
Lopez de Leon, Alfredo, Davis, CA, UNITED STATES  
PA NOVOZYMES, INC., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 20080206815 A1 20080828  
AI US 2008-53193 A1 20080321 (12)  
RLI Division of Ser. No. US 2005-46124, filed on 28 Jan 2005, Pat. No. US 7361495  
PRAI US 2004-540661P 20040130 (60)  
DT Utility  
FS APPLICATION  
LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
CLMN Number of Claims: 20  
ECL Exemplary Claim: 1  
DRWN 37 Drawing Page(s)  
LN.CNT 6620

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having cellulolytic enhancing activity and isolated polynucleotides encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the polynucleotides as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 7 OF 33 USPATFULL on STN  
AN 2008:229662 USPATFULL <<LOGINID::20090326>>  
TI Polypeptides Having Beta-Glucosidase Activity and Polynucleotides Encoding Same  
IN Krogh, Kristian, Bagsvaerd, DENMARK  
Harris, Paul, Carnation, WA, UNITED STATES  
PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 20080201805 A1 20080821  
AI US 2006-997625 A1 20060804 (11)  
WO 2006-US30719 20060804  
20080201 PCT 371 date  
PRAI US 2005-705607P 20050804 (60)

DT Utility  
FS APPLICATION  
LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
CLMN Number of Claims: 42  
ECL Exemplary Claim: 1  
DRWN 11 Drawing Page(s)  
LN.CNT 3577

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having beta-glucosidase activity and isolated polynucleotides encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the polynucleotides as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 8 OF 33 USPATFULL on STN

AN 2008:221096 USPATFULL <<LOGINID::20090326>>

TI KLUYVEROMYCES STRAINS METABOLIZING CELLULOSIC AND HEMICELLULOSIC MATERIALS

IN Levine, Robert Paul, Palo Alto, CA, UNITED STATES

PA Phage Biotechnology, Las Vegas, NV, UNITED STATES (U.S. corporation)

PI US 20080193992 A1 20080814

AI US 2008-24889 A1 20080201 (12)

RLI Division of Ser. No. US 2004-759785, filed on 16 Jan 2004, Pat. No. US 7344876

PRAI US 2003-442455P 20030124 (60)

DT Utility

FS APPLICATION

LREP KNOBBE MARTENS OLSON & BEAR LLP, 2040 MAIN STREET, FOURTEENTH FLOOR, IRVINE, CA, 92614, US

CLMN Number of Claims: 30

ECL Exemplary Claim: 1

DRWN 7 Drawing Page(s)

LN.CNT 1145

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB This invention relates to the use of microorganisms for the generation of ethanol from lignocellulosic waste materials. Yeast strains of the genus Kluyveromyces which have the capability to ferment cellulose, hexose sugars to ethanol are provided. Also provided are methods for converting cellulose, hexoses, or mixed hydrolysates of hexoses to ethanol by fermentation with Kluyveromyces strains. The invention also provides methods to isolate yeast strains which metabolize cellulose, pentoses, or hemicelluloses from waste materials.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 9 OF 33 USPATFULL on STN

AN 2008:221095 USPATFULL <<LOGINID::20090326>>

TI PROCESS FOR IMPROVING THE YIELD AND EFFICIENCY OF AN ETHANOL FERMENTATION PLANT

IN Allen, Stephen D., Eagle, ID, UNITED STATES

Rusnack, Michael R., Star, ID, UNITED STATES

PA WATER SOLUTIONS, INC., Sioux Falls, SD, UNITED STATES (U.S. corporation)

PI US 20080193991 A1 20080814

AI US 2008-30578 A1 20080213 (12)

PRAI US 2007-889644P 20070213 (60)

US 2007-955282P 20070810 (60)

DT Utility

FS APPLICATION

LREP KIRTON AND MCCONKIE, 60 EAST SOUTH TEMPLE,, SUITE 1800, SALT LAKE CITY,

UT, 84111, US  
CLMN Number of Claims: 20  
ECL Exemplary Claim: 1  
DRWN 6 Drawing Page(s)  
LN.CNT 810

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB A process for improving the yield and efficiency of an ethanol fermentation plant that receives organic fermentable feedstock material, prepares the feedstock for fermentation, ferments the feedstock with yeast to produce ethanol, and produces stillage as a byproduct of ethanol fermentation. The process steps which can be operated independently or in combination, may include, but are not limited to, degrading fatty acids in the fermentable feedstock material prior to fermentation; degrading cellulose and hemicellulose present in the feedstock prior to fermentation; adding a surfactant to the fermentable feedstock; separating a liquid fraction from the stillage; recycling the liquid fraction to be combined with the fermentable feedstock; recovering a solid fraction from the stillage; and introducing at least a portion of the solid fraction to an anaerobic digester to produce methane.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 10 OF 33 USPATFULL on STN  
AN 2008:195715 USPATFULL <<LOGINID::20090326>>  
TI DETOXIFYING PRE-TREATED LIGNOCELLULOSE-CONTAINING MATERIALS  
IN Holmes, Jason W., Zebulon, NC, UNITED STATES  
Deinhammer, Randy, Wake Forest, NC, UNITED STATES  
Soong, Chee Leong, Raleigh, NC, UNITED STATES  
PA Novozymes North America, Inc., Franklinton, NC, UNITED STATES (U.S. corporation)  
PI US 20080171370 A1 20080717  
AI US 2007-954482 A1 20071212 (11)  
PRAI US 2006-870420P 20061218 (60)  
US 2007-890652P 20070220 (60)  
DT Utility  
FS APPLICATION  
LREP NOVOZYMES NORTH AMERICA, INC., 500 FIFTH AVENUE, SUITE 1600, NEW YORK, NY, 10110, US  
CLMN Number of Claims: 21  
ECL Exemplary Claim: 1-24  
DRWN 6 Drawing Page(s)  
LN.CNT 1631

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to a process of detoxifying pretreated lignocellulose-containing material by subjecting pre-treated material to a detoxifying compound capable of binding 1) pre-treated lignocellulose degradation products and/or 2) acetic acid. The detoxifying compound may also be an amidase and/or an anhydrase. The invention also relates to a process of producing a fermentation product including a detoxification process of the invention.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 11 OF 33 USPATFULL on STN  
AN 2008:4470 USPATFULL <<LOGINID::20090326>>  
TI Polypeptides having cellulolytic enhancing activity and polynucleotides encoding same  
IN Dotson, William D., Plainsboro, NJ, UNITED STATES  
Greenier, Jennifer, Vacaville, CA, UNITED STATES  
Ding, Hanshu, Davis, CA, UNITED STATES

PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 20080003645 A1 20080103  
AI US 2007-835872 A1 20070808 (11)  
RLI Continuation of Ser. No. US 2005-51670, filed on 4 Feb 2005, GRANTED,  
Pat. No. US 7271244  
PRAI US 2004-542614P 20040206 (60)  
DT Utility  
FS APPLICATION  
LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
CLMN Number of Claims: 22  
ECL Exemplary Claim: 1  
DRWN 5 Drawing Page(s)  
LN.CNT 3646

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having  
cellulolytic enhancing activity and isolated nucleic acids encoding the  
polypeptides. The invention also relates to nucleic acid constructs,  
vectors, and host cells comprising the nucleic acids as well as methods  
for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 12 OF 33 USPATFULL on STN  
AN 2007:179507 USPATFULL <<LOGINID::20090326>>  
TI Amylases, nucleic acids encoding them and methods for making and using  
them  
IN Callen, Walter, San Diego, CA, UNITED STATES  
Richardson, Toby, San Diego, CA, UNITED STATES  
Frey, Gerhard, San Diego, CA, UNITED STATES  
Gray, Kevin, San Diego, CA, UNITED STATES  
Kerovuo, Janne S., San Diego, CA, UNITED STATES  
Slupska, Malgorzata, San Diego, CA, UNITED STATES  
Barton, Nelson, San Diego, CA, UNITED STATES  
O'Donoghue, Eileen, San Diego, CA, UNITED STATES  
Miller, Carl, Raleigh, NC, UNITED STATES  
PI US 20070157329 A1 20070705  
AI US 2004-547957 A1 20040308 (10)  
WO 2004-US7096 20040308  
20060630 PCT 371 date  
PRAI US 2003-10385305 20030306  
US 2003-459014P 20030328 (60)  
DT Utility  
FS APPLICATION  
LREP DIVERSA C/O MOFO S.D., 12531 HIGH BLUFF DRIVE, SUITE 100, SAN DIEGO, CA,  
92130-2040, US  
CLMN Number of Claims: 86  
ECL Exemplary Claim: 1  
DRWN 163 Drawing Page(s)  
LN.CNT 9683

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB In one aspect, the invention is directed to polypeptides having an  
amylase activity, polynucleotides encoding the polypeptides, and methods  
for malting and using these polynucleotides and polypeptides. In one  
aspect, the polypeptides of the invention can be used as amylases, for  
example, alpha amylases, to catalyze the hydrolysis of starch into  
sugars. In one aspect, the invention provides delayed release  
compositions comprising an desired ingredient coated by a latex polymer  
coating.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 13 OF 33 USPATFULL on STN  
AN 2007:120989 USPATFULL <<LOGINID::20090326>>  
TI Cyclodextrin affinity purification  
IN Villafranca, Joseph John, New Hope, PA, UNITED STATES  
Hakes, David James, Willow Grove, PA, UNITED STATES  
Johnson, Karl F., Hatboro, PA, UNITED STATES  
Willett, Walter Scott, Doylestown, PA, UNITED STATES  
Meyers, Chester A., Medford, NJ, UNITED STATES  
PI US 20070105192 A1 20070510  
AI US 2004-555123 A1 20040505 (10)  
WO 2004-US13841 20040505  
20060807 PCT 371 date  
PRAI US 2003-60468374 20030505  
DT Utility  
FS APPLICATION  
LREP MORGAN, LEWIS & BOCKIUS LLP (SF), 2 PALO ALTO SQUARE, 3000 El Camino  
Real, Suite 700, PALO ALTO, CA, 94306, US  
CLMN Number of Claims: 33  
ECL Exemplary Claim: 1  
DRWN 10 Drawing Page(s)  
LN.CNT 3259  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
AB A method of immobilizing a molecular species that include a  
starch-binding domain is provided. There also is provided a material  
upon which the molecular species is immobilized, and a material that is  
capable of immobilizing the species. The method includes binding the  
species to a solid support, e.g., membranes, chromatographic supports  
and the like. The immobilized species is optionally purified by the  
method of the invention. Alternatively, the immobilized species is use  
in another method, such as in a synthesis as a synthetic reagent, or to  
purify another species that has an affinity for the immobilized species.  
Exemplary immobilized molecular species include bioactive agents, and  
biomolecules.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 14 OF 33 USPATFULL on STN  
AN 2007:89057 USPATFULL <<LOGINID::20090326>>  
TI Methods for enhancing the degradation or conversion of cellulosic  
material  
IN Harris, Paul, Carnation, WA, UNITED STATES  
Rey, Michael, Davis, CA, UNITED STATES  
Ding, Hanshu, Davis, CA, UNITED STATES  
PA Novozymes, Inc., Davis, CA, UNITED STATES, 95616 (U.S. corporation)  
PI US 20070077630 A1 20070405  
AI US 2006-541099 A1 20060929 (11)  
PRAI US 2005-722579P 20050930 (60)  
DT Utility  
FS APPLICATION  
LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
CLMN Number of Claims: 75  
ECL Exemplary Claim: 1  
DRWN 5 Drawing Page(s)  
LN.CNT 3521  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
AB The present invention relates to methods for degrading or converting a  
cellulosic material and for producing a substance from a cellulosic  
material.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 15 OF 33 USPATFULL on STN  
 AN 2006:5819 USPATFULL <<LOGINID::20090326>>  
 TI Polypeptides having cellulolytic enhancing activity and polynucleotides encoding same  
 IN Dotson, William D., Plainsboro, NJ, UNITED STATES  
 Greenier, Jennifer, Vacaville, CA, UNITED STATES  
 Ding, Hanshu, Davis, CA, UNITED STATES  
 PA Novozymes Biotech, Inc., Davis, CA, UNITED STATES, 95616 (U.S. corporation)  
 PI US 20060005279 A1 20060105  
 US 7271244 B2 20070918  
 AI US 2005-51670 A1 20050204 (11)  
 PRAI US 2004-542614P 20040206 (60)  
 DT Utility  
 FS APPLICATION  
 LREP NOVOZYMES, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
 CLMN Number of Claims: 66  
 ECL Exemplary Claim: 1  
 DRWN 5 Drawing Page(s)  
 LN.CNT 3663  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 AB The present invention relates to isolated polypeptides having cellulolytic enhancing activity and isolated nucleic acids encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the nucleic acids as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 16 OF 33 USPATFULL on STN  
 AN 2005:268106 USPATFULL <<LOGINID::20090326>>  
 TI Methods for degrading or converting plant cell wall polysaccharides  
 IN Berka, Randy, Davis, CA, UNITED STATES  
 Cherry, Joel, Davis, CA, UNITED STATES  
 PA Novozymes Biotech, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
 PI US 20050233423 A1 20051020  
 US 7413882 B2 20080819  
 AI US 2005-78921 A1 20050310 (11)  
 PRAI US 2004-556779P 20040325 (60)  
 DT Utility  
 FS APPLICATION  
 LREP NOVOZYMES BIOTECH, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
 CLMN Number of Claims: 42  
 ECL Exemplary Claim: 1  
 DRWN 17 Drawing Page(s)  
 LN.CNT 3179  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 AB The present invention relates to methods for converting plant cell wall polysaccharides into one or more products, comprising: treating the plant cell wall polysaccharides with an effective amount of a spent whole fermentation broth of a recombinant microorganism, wherein the recombinant microorganism expresses one or more heterologous genes encoding enzymes which degrade or convert the plant cell wall polysaccharides into the one or more products. The present invention also relates to methods for producing an organic substance, comprising: (a) saccharifying plant cell wall polysaccharides with an effective amount of a spent whole fermentation broth of a recombinant microorganism, wherein the recombinant microorganism expresses one or more heterologous genes encoding enzymes which degrade or convert the plant cell wall polysaccharides into saccharified material; (b) fermenting the saccharified material of step (a) with one or more

fermenting microorganisms; and (c) recovering the organic substance from the fermentation.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 17 OF 33 USPATFULL on STN  
AN 2005:221001 USPATFULL <<LOGINID::20090326>>  
TI Polypeptides having cellulolytic enhancing activity and polynucleotides encoding same  
IN Brown, Kimberly, Elk Grove, CA, UNITED STATES  
Harris, Paul, Carnation, WA, UNITED STATES  
Zaretsky, Elizabeth, Reno, NV, UNITED STATES  
Re, Edward, Davis, CA, UNITED STATES  
Vlasenko, Elena, Davis, CA, UNITED STATES  
McFarland, Keith, Davis, CA, UNITED STATES  
Lopez de Leon, Alfredo, Davis, CA, UNITED STATES  
PA Novozymes Biotech, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 20050191736 A1 20050901  
US 7361495 B2 20080422  
AI US 2005-46124 A1 20050128 (11)  
PRAI US 2004-540661P 20040130 (60)  
DT Utility  
FS APPLICATION  
LREP NOVOZYMES BIOTECH, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
CLMN Number of Claims: 73  
ECL Exemplary Claim: 1  
DRWN 37 Drawing Page(s)  
LN.CNT 6721

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having cellulolytic enhancing activity and isolated polynucleotides encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the polynucleotides as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 18 OF 33 USPATFULL on STN  
AN 2005:189443 USPATFULL <<LOGINID::20090326>>  
TI Methods for degrading lignocellulosic materials  
IN Vlasenko, Elena, Davis, CA, UNITED STATES  
Cherry, Joel, Davis, CA, UNITED STATES  
Xu, Feng, Davis, CA, UNITED STATES  
PA Novozymes Biotech, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 20050164355 A1 20050728  
US 7354743 B2 20080408  
AI US 2005-36871 A1 20050114 (11)  
PRAI US 2004-537452P 20040116 (60)  
DT Utility  
FS APPLICATION  
LREP NOVOZYMES BIOTECH, INC., 1445 DREW AVE, DAVIS, CA, 95616, US  
CLMN Number of Claims: 53  
ECL Exemplary Claim: 1  
DRWN 29 Drawing Page(s)  
LN.CNT 3003

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to methods for degrading a lignocellulosic material, comprising: treating the lignocellulosic material with an effective amount of one or more cellulolytic enzymes in the presence of at least one surfactant selected from the group consisting of a secondary alcohol ethoxylate, fatty alcohol ethoxylate, nonylphenol

ethoxylate, tridecyl ethoxylate, and polyoxyethylene ether, wherein the presence of the surfactant increases the degradation of lignocellulosic material compared to the absence of the surfactant. The present invention also relates to methods for producing an organic substance, comprising: (a) saccharifying a lignocellulosic material with an effective amount of one or more cellulolytic enzymes in the presence of at least one surfactant selected from the group consisting of a secondary alcohol ethoxylate, fatty alcohol ethoxylate, nonylphenol ethoxylate, tridecyl ethoxylate, and polyoxyethylene ether, wherein the presence of the surfactant increases the degradation of lignocellulosic material compared to the absence of the surfactant; (b) fermenting the saccharified lignocellulosic material of step (a) with one or more fermenting microorganisms; and (c) recovering the organic substance from the fermentation.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 19 OF 33 USPATFULL on STN  
AN 2005:171309 USPATFULL <<LOGINID::20090326>>  
TI Kluyveromyces strains metabolizing cellulosic and hemicellulosic materials  
IN Levine, Robert Paul, Carmel Valley, CA, UNITED STATES  
PA Enogen, Inc., Salinas, CA, UNITED STATES (U.S. corporation)  
PI US 20050148056 A1 20050707  
US 7344876 B2 20080318  
AI US 2004-759785 A1 20040116 (10)  
PRAI US 2003-442455P 20030124 (60)  
DT Utility  
FS APPLICATION  
LREP TOWNSEND AND TOWNSEND AND CREW, LLP, TWO EMBARCADERO CENTER, EIGHTH FLOOR, SAN FRANCISCO, CA, 94111-3834, US  
CLMN Number of Claims: 30  
ECL Exemplary Claim: 1  
DRWN 7 Drawing Page(s)  
LN.CNT 1145

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB This invention relates to the use of microorganisms for the generation of ethanol from lignocellulosic waste materials. Yeast strains of the genus Kluyveromyces which have the capability to ferment cellulose, hexose sugars to ethanol are provided. Also provided are methods for converting cellulose, hexoses, or mixed hydrolysates of hexoses to ethanol by fermentation with Kluyveromyces strains. The invention also provides methods to isolate yeast strains which metabolize cellulose, pentoses, or hemicelluloses from waste materials.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 20 OF 33 USPATFULL on STN  
AN 2004:120567 USPATFULL <<LOGINID::20090326>>  
TI Method for the modification of polymeric carbohydrate materials  
IN Teeri, Tuula Tellervo, Taby, SWEDEN  
Brumer III, Harry, Johanneshov, SWEDEN  
PI US 20040091977 A1 20040513  
AI US 2003-380907 A1 20031009 (10)  
WO 2002-IB4567 20021016  
PRAI SE 2001-3446 20011016  
SE 2001-3447 20011016  
SE 2002-2310 20020723  
DT Utility  
FS APPLICATION  
LREP FOLEY AND LARDNER, SUITE 500, 3000 K STREET NW, WASHINGTON, DC, 20007



CLMN Number of Claims: 38  
ECL Exemplary Claim: 1  
DRWN 11 Drawing Page(s)  
LN.CNT 1897

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention makes available a method to introduce specific chemical groups onto the surface of any polymeric carbohydrate material to alter the physico-chemical properties of said material. In particular, the method comprises the controlled introduction of chemically-modified oligosaccharides into a carbohydrate polymer using a transglycosylating enzyme.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 21 OF 33 USPATFULL on STN

AN 2003:120114 USPATFULL <<LOGINID::20090326>>

TI Nucleic acids of aspergillus fumigatus encoding industrial enzymes and methods of use

IN Jiang, Bo, Montreal, CANADA  
Storms, Reginald, Beaconsfield, CANADA  
Roemer, Terry, Montreal, CANADA  
Bussey, Howard, Westmount, CANADA

PI US 20030082595 A1 20030501

AI US 2002-213990 A1 20020805 (10)

PRAI US 2001-309870P 20010803 (60)

DT Utility

FS APPLICATION

LREP PENNIE AND EDMONDS, 1155 AVENUE OF THE AMERICAS, NEW YORK, NY, 100362711

CLMN Number of Claims: 45

ECL Exemplary Claim: 1

DRWN 2 Drawing Page(s)

LN.CNT 8033

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention provides nucleotide sequences of Aspergillus fumigatus that encode proteins which exhibit enzyme activities. Vectors, expression constructs, and host cells comprising the nucleotide sequences of the enzyme genes are also provided. The invention further provides methods for producing the enzymes, and methods for modifying the enzymes in order to improve their desirable characteristics. The activities displayed by the enzymes of the invention include those of a tannase, cellulase, glucose oxidase, glucoamylase, phytase,  $\beta$ -galactosidases, invertase, lipase,  $\alpha$ -amylase, laccase, polygalacturonase or xylanase. The enzymes of the invention can be used in a variety of industrial processes. Enzymatically active compositions in various forms as well as antibodies to the enzymes and fragments thereof, are also provided.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 22 OF 33 USPATFULL on STN

AN 2003:93549 USPATFULL <<LOGINID::20090326>>

TI Laundry detergent and/or fabric care compositions comprising a transferase

IN Barnabas, Mary Vjayarani, West Chester, OH, UNITED STATES  
Baeck, Andre Cesar, Bonheiden, BELGIUM  
Showell, Michael Stanford, Cincinnati, OH, UNITED STATES  
Smets, Johan, Lubbeek, BELGIUM  
Convents, Andre Christian, Cincinnati, OH, UNITED STATES  
Hubesch, Bruno Albert Jean, Neerijse, BELGIUM  
Vermote, Christian Leo Marie, Destelbergen, BELGIUM

PA The Procter & Gamble Company, Cincinnati, OH, UNITED STATES, 45224 (U.S.)

corporation)  
PI US 20030064909 A1 20030403  
AI US 2002-166906 A1 20020611 (10)  
RLI Continuation of Ser. No. US 2000-674230, filed on 27 Oct 2000, ABANDONED  
A 371 of International Ser. No. WO 1998-US8629, filed on 29 Apr 1998,  
UNKNOWN  
DT Utility  
FS APPLICATION  
LREP THE PROCTER & GAMBLE COMPANY, INTELLECTUAL PROPERTY DIVISION, WINTON  
HILL TECHNICAL CENTER - BOX 161, 6110 CENTER HILL AVENUE, CINCINNATI,  
OH, 45224  
CLMN Number of Claims: 29  
ECL Exemplary Claim: 1  
DRWN No Drawings  
LN.CNT 2421

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to laundry detergent and/or fabric care  
compositions comprising a transferase, preferably an alkaline  
transferase, wherein when said transferase is a xyloglucan transferase,  
said xyloglucan transferase exhibits greater transferase activity than  
hydrolytic activity and/or exhibits higher reaction rates for donor  
substrates with higher molecular weight than for donor substrates with  
lower molecular weight.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 23 OF 33 USPATFULL on STN  
AN 2002:152607 USPATFULL <<LOGINID::20090326>>  
TI Laundry detergent and/or fabric care compositions comprising a modified  
transferase  
IN Smets, Johan, Lubbeek, BELGIUM  
Barnabas, Mary Vijayarani, West Chester, OH, United States  
Showell, Michael Stanford, Cincinnati, OH, United States  
Boyer, Stanton Lane, Fairfield, OH, United States  
Convents, Andre Christian, Cincinnati, OH, United States  
PA Procter & Gamble Company, Cincinnati, OH, United States (U.S.  
corporation)  
PI US 6410498 B1 20020625  
WO 9957254 19991111  
AI US 2000-674472 20001111 (9)  
WO 1999-US9480 19990430  
20001101 PCT 371 date  
DT Utility  
FS GRANTED  
EXNAM Primary Examiner: Douyon, Lorna M.; Assistant Examiner: Elhilo, Eisa  
LREP Cook, C. Brant, Zerby, Kim W., Miller, Steve W.  
CLMN Number of Claims: 38  
ECL Exemplary Claim: 1  
DRWN 0 Drawing Figure(s); 0 Drawing Page(s)  
LN.CNT 3228

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to a modified enzyme which  
comprises a catalytically active amino acid sequence of a transferase  
linked to an amino acid sequence comprising a Cellulose  
Binding Domain (CBD). The present invention further relates to laundry  
detergent and/or fabric care compositions comprising such modified  
enzyme, for improved fabric care and cleaning benefits.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 24 OF 33 USPATFULL on STN

AN 2001:36957 USPATFULL <<LOGINID::20090326>>  
 TI Polypeptide with reduced respiratory allergenicity  
 IN Olsen, Arne Agerlin, Virum, Denmark  
 Hansen, Lars Bo, Herlev, Denmark  
 Beck, Thomas Christian, Birker.o slashed.d, Denmark  
 PA Novo Nordisk A/S, Bagsvaerd, Denmark (non-U.S. corporation)  
 PI US 6201110 B1 20010313  
 AI US 2000-610751 20000706 (9)  
 RLI Continuation of Ser. No. US 1999-405311, filed on 20 Sep 1999, now  
 patented, Pat. No. US 6114509 Continuation of Ser. No. US 1998-150891,  
 filed on 10 Sep 1998, now patented, Pat. No. US 5981718 Continuation of  
 Ser. No. US 1997-836293, filed on 12 May 1997, now patented, Pat. No. US  
 5856451 Continuation of Ser. No. WO 1994-DK9500497, filed on 7 Dec 1994  
 PRAI DK 1994-1395 19941207  
 DK 1994-1396 19941207  
 DK 1994-1397 19941207  
 DK 1994-1398 19941207  
 DK 1994-1399 19941207  
 DK 1994-1400 19941207  
 DK 1994-1401 19941207  
 DT Utility  
 FS Granted  
 EXNAM Primary Examiner: Sayala, Chhaya D.  
 LREP Lambiris, Esq., Elias J.  
 CLMN Number of Claims: 14  
 ECL Exemplary Claim: 1  
 DRWN 5 Drawing Figure(s); 5 Drawing Page(s)  
 LN.CNT 2239  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 AB The invention relates to modified polypeptides with reduced respiratory  
 allergenicity comprising a parent polypeptide with a molecular weight  
 from between 10 kDa and 100 kDa conjugated to a polymer with a molecular  
 weight (M.sub.r) in the range of 1 kDa and 60 kDa. The modified  
 polypeptide are produced using a process including the step of  
 conjugating from 1 to 30 polymer molecules with the parent polypeptide.  
 Further the invention relates to compositions comprising said  
 polypeptides and further ingredients normally used in e.g. detergents,  
 including dishwashing detergents and soap bars, household article,  
 agrochemicals, personal care products, cosmetics, toiletries, oral and  
 dermal pharmaceuticals, composition for treating textiles, and  
 compositions used for manufacturing food and feed. Finally the invention  
 is directed to uses of polypeptides with reduced allergenicity or  
 compositions thereof for reducing the allergenicity of products for a  
 vast number of industrial applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 25 OF 33 USPATFULL on STN  
 AN 2000:117890 USPATFULL <<LOGINID::20090326>>  
 TI Polypeptide with reduced allergenicity  
 IN Olsen, Arne Agerlin, Virum, Denmark  
 Hansen, Lars Bo, Herlev, Denmark  
 Beck, Thomas Christian, Birker.o slashed.d, Denmark  
 PA Novo Nordisk A/S, Bagsvard, Denmark (non-U.S. corporation)  
 PI US 6114509 20000905  
 AI US 1999-405311 19990920 (9)  
 RLI Continuation of Ser. No. US 1998-150891, filed on 10 Sep 1998, now  
 patented, Pat. No. US 5981718 which is a continuation of Ser. No. US  
 1997-836293, filed on 12 May 1997, now patented, Pat. No. US 5856451  
 which is a continuation of Ser. No. WO 1995-DK497, filed on 7 Dec 1995  
 PRAI DK 1994-1395 19941207

	DK 1994-1396	19941207
	DK 1994-1397	19941207
	DK 1994-1398	19941207
	DK 1994-1399	19941207
	DK 1994-1400	19941207
	DK 1994-1401	19941207
DT	Utility	
FS	Granted	
EXNAM	Primary Examiner: Sayala, Chhaya D.	
LREP	Zelson, Esq., Steve T., Green, Esq., Reza	
CLMN	Number of Claims: 21	
ECL	Exemplary Claim: 1	
DRWN	5 Drawing Figure(s); 5 Drawing Page(s)	
LN.CNT	2255	

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to modified polypeptides with reduced allergenicity comprising a parent polypeptide with a molecular weight from between 10 kDa and 100 kDa conjugated to a polymer with a molecular weight (M.sub.r) in the range of 1 kDa and 60 kDa. The modified polypeptide are produced using a process including the step of conjugating from 1 to 30 polymer molecules with the parent polypeptide. Further the invention relates to compositions comprising said polypeptides and further ingredients normally used in e.g. detergents, including dishwashing detergents and soap bars, household article, agrochemicals, personal care products, cosmetics, toiletries, oral and dermal pharmaceuticals, composition for treating textiles, and compositions used for manufacturing food and feed. Finally the invention is directed to uses of polypeptides with reduced allergenicity or compositions thereof for reducing the allergenicity of products for a vast number of industrial applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 26 OF 33 USPATFULL on STN

AN	1999:142125	USPATFULL <<LOGINID::20090326>>
TI	Polypeptide with reduced allergenicity	
IN	Olsen, Arne Agerlin, Virum, Denmark	
	Hansen, Lars Bo, Herlev, Denmark	
	Beck, Thomas Christian, Birker.o slashed.d, Denmark	
PA	Novo Nordisk A/S, Bagsvaerd, Denmark (non-U.S. corporation)	
PI	US 5981718	19991109
AI	US 1998-150891	19980910 (9)
RLI	Continuation of Ser. No. US 1997-836293, filed on 12 May 1997, now patented, Pat. No. US 5856451 which is a continuation of Ser. No. WO 1995-DK497, filed on 7 Dec 1995	

PRAI	DK 1994-1395	19941207
	DK 1994-1396	19941207
	DK 1994-1397	19941207
	DK 1994-1398	19941207
	DK 1994-1399	19941207
	DK 1994-1400	19941207
	DK 1994-1401	19941207
DT	Utility	
FS	Granted	
EXNAM	Primary Examiner: Sayala, Chhaya D.	
LREP	Zelson, Esq., Steve T., Esq., Reza Green	
CLMN	Number of Claims: 12	
ECL	Exemplary Claim: 1	
DRWN	5 Drawing Figure(s); 5 Drawing Page(s)	
LN.CNT	2257	

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to modified polypeptides with reduced allergenicity comprising a parent polypeptide with a molecular weight from between 10 kDa and 100 kDa conjugated to a polymer with a molecular weight (M.sub.r) in the range of 1 kDa and 60 kDa. The modified polypeptide are produced using a process including the step of conjugating from 1 to 30 polymer molecules with the parent polypeptide. Further the invention relates to compositions comprising said polypeptides and further ingredients normally used in e.g. detergents, including dishwashing detergents and soap bars, household article, agrochemicals, personal care products, cosmetics, toiletries, oral and dermal pharmaceuticals, composition for treating textiles, and compositions used for manufacturing food and feed. Finally the invention is directed to uses of polypeptides with reduced allergenicity or compositions thereof for reducing the allergenicity of products for a vast number of industrial applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 27 OF 33 USPATFULL on STN  
 AN 1999:1779 USPATFULL <<LOGINID::20090326>>  
 TI Method for reducing respiratory allergenicity  
 IN Olsen, Arne Agerlin, Virum, Denmark  
 Hansen, Lars Bo, Herlev, Denmark  
 Beck, Thomas Christian, Birkerød, Denmark  
 PA Novo Nordisk A/S, Bagsvaerd, Denmark (non-U.S. corporation)  
 PI US 5856451 19990105  
 WO 9617929 19960613  
 AI US 1997-836293 19970512 (8)  
 WO 1995-DK497 19951207  
 19970512 PCT 371 date  
 19970512 PCT 102(e) date  
 PRAI DK 1994-1395 19941207  
 DK 1994-1396 19941207  
 DK 1994-1397 19941207  
 DK 1994-1398 19941207  
 DK 1994-1399 19941207  
 DK 1994-1400 19941207  
 DK 1994-1401 19941207  
 DT Utility  
 FS Granted  
 EXNAM Primary Examiner: Sayala, Chhaya D.  
 LREP Zelson, Esq., Steve T., Agris, Esq., Cheryl H.  
 CLMN Number of Claims: 37  
 ECL Exemplary Claim: 1  
 DRWN 5 Drawing Figure(s); 5 Drawing Page(s)  
 LN.CNT 2323

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The invention relates to modified polypeptides with reduced allergenicity comprising a parent polypeptide with a molecular weight from between 10 kDa and 100 kDa conjugated to a polymer with a molecular weight (M.sub.r) in the range of 1 kDa and 60 kDa. The modified polypeptide are produced using a process including the step of conjugating from 1 to 30 polymer molecules with the parent polypeptide. Further the invention relates to compositions comprising said polypeptides and further ingredients normally used in e.g. detergents, including dishwashing detergents and soap bars, household article, agrochemicals, personal care products, cosmetics, toiletries, oral and dermal pharmaceuticals, composition for treating textiles, and compositions used for manufacturing food and feed. Finally the invention is directed to uses of polypeptides with reduced allergenicity or compositions thereof for reducing the allergenicity of products for a vast number of industrial applications.

vast number of industrial applications.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 28 OF 33 USPATFULL on STN  
AN 95:108080 USPATFULL <<LOGINID::20090326>>  
TI Enzymatic method for synthesis of cellulose 1  
IN Brown, Jr., R. Malcolm, 305 Skyline Dr., Austin, TX, United States  
78746  
Kobayashi, Shiro, 1-8-21, Yagiyama-minami, Taihaku-ku, Sendai, Miyagi,  
Japan  
Kudlicka, Krystyna, 1401 St. Edwards Dr. #148, Austin, TX, United States  
78704  
Kuga, Shigenori, 3-4-7 Mizukino, Moriya-machi, Ibaraki-ken, 302-01,  
Japan  
Lee, Jong, 3455 Lake Austin Blvd. #D, Austin, TX, United States 78703  
Li, Likun, 1908 Carroll St., Apt. #1, Houston, TX, United States 77030  
Okuda, Kazuo, 10-41 Ozu-cho #424, Kochi 780, Japan  
Shoda, Shin-Ichiro, 4-7-25-601, Chuoh, Aoba-ku, Sendai, Miyagi, Japan  
PI US 5472859 19951205  
AI US 1993-100868 19930802 (8)  
DT Utility  
FS Granted  
EXNAM Primary Examiner: Knode, Marian C.; Assistant Examiner: Probst,  
Francisco C.  
LREP Arnold, White & Durkee  
CLMN Number of Claims: 4  
ECL Exemplary Claim: 1  
DRWN 16 Drawing Figure(s); 10 Drawing Page(s)  
LN.CNT 1479

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention discloses a method of synthesizing a novel form of  
cellulose I as well as methods of synthesizing a novel form of  
cellulose I in vitro. One method comprises contacting an  
activated saccharide substrate with an endoglucanase in an appropriate  
organic solvent/buffer ratio. The invention also encompasses a partially  
purified endoglucanase and a method of synthesizing  
cellooligosaccharides. A second method comprises contacting a nucleotide  
sugar with a purified glycosyl transferase in an appropriate buffer  
medium to insure polymerization and crystallization of parallel  
glucan chains from the enzyme/micelle complex to form  
cellulose I.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 29 OF 33 USPAT2 on STN  
AN 2006:5819 USPAT2 <<LOGINID::20090326>>  
TI Polypeptides having cellulolytic enhancing activity and polynucleotides  
encoding same  
IN Dotson, William D., Plainsboro, NJ, UNITED STATES  
Greenier, Jennifer, Vacaville, CA, UNITED STATES  
Ding, Hanshu, Davis, CA, UNITED STATES  
PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 7271244 B2 20070918  
AI US 2005-51670 20050204 (11)  
PRAI US 2004-542614P 20040206 (60)  
DT Utility  
FS GRANTED  
EXNAM Primary Examiner: Rao, Manjunath  
LREP Starnes, Robert L.  
CLMN Number of Claims: 27

ECL Exemplary Claim: 1  
DRWN 5 Drawing Figure(s); 5 Drawing Page(s)  
LN.CNT 3640

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to isolated polypeptides having cellulolytic enhancing activity and isolated nucleic acids encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the nucleic acids as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 30 OF 33 USPAT2 on STN

AN 2005:268106 USPAT2 <<LOGINID::20090326>>

TI Methods for degrading or converting plant cell wall polysaccharides

IN Berka, Randy, Davis, CA, UNITED STATES

Cherry, Joel, Davis, CA, UNITED STATES

PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)

PI US 7413882 B2 20080819

AI US 2005-78921 20050310 (11)

PRAI US 2004-556779P 20040325 (60)

DT Utility

FS GRANTED

EXNAM Primary Examiner: Prouty, Rebecca E.; Assistant Examiner: Raghu, Ganapathirama

LREP Stames, Robert L.

CLMN Number of Claims: 9

ECL Exemplary Claim: 1

DRWN 17 Drawing Figure(s); 17 Drawing Page(s)

LN.CNT 3130

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB The present invention relates to methods for converting plant cell wall polysaccharides into one or more products, comprising: treating the plant cell wall polysaccharides with an effective amount of a spent whole fermentation broth of a recombinant microorganism, wherein the recombinant microorganism expresses one or more heterologous genes encoding enzymes which degrade or convert the plant cell wall polysaccharides into the one or more products. The present invention also relates to methods for producing an organic substance, comprising: (a) saccharifying plant cell wall polysaccharides with an effective amount of a spent whole fermentation broth of a recombinant microorganism, wherein the recombinant microorganism expresses one or more heterologous genes encoding enzymes which degrade or convert the plant cell wall polysaccharides into saccharified material; (b) fermenting the saccharified material of step (a) with one or more fermenting microorganisms; and (c) recovering the organic substance from the fermentation.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 31 OF 33 USPAT2 on STN

AN 2005:221001 USPAT2 <<LOGINID::20090326>>

TI Polypeptide from a cellulolytic fungus having cellulolytic enhancing activity

IN Brown, Kimberly, Elk Grove, CA, UNITED STATES

Harris, Paul, Carnation, WA, UNITED STATES

Zaretsky, Elizabeth, Reno, NV, UNITED STATES

Re, Edward, Davis, CA, UNITED STATES

Vlasenko, Elena, Davis, CA, UNITED STATES

McFarland, Keith, Davis, CA, UNITED STATES

Lopez de Leon, Alfredo, Davis, CA, UNITED STATES

PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 7361495 B2 20080422  
AI US 2005-46124 20050128 (11)  
PRAI US 2004-540661P 20040130 (60)  
DT Utility  
FS GRANTED  
EXNAM Primary Examiner: Prouty, Rebecca; Assistant Examiner: Kosson, Rosanne  
LREP Starnes, Robert L.  
CLMN Number of Claims: 16  
ECL Exemplary Claim: 1  
DRWN 37 Drawing Figure(s); 37 Drawing Page(s)  
LN.CNT 6628  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
AB The present invention relates to isolated polypeptides having cellulolytic enhancing activity and isolated polynucleotides encoding the polypeptides. The invention also relates to nucleic acid constructs, vectors, and host cells comprising the polynucleotides as well as methods for producing and using the polypeptides.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L12 ANSWER 32 OF 33 USPAT2 on STN  
AN 2005:189443 USPAT2 <<LOGINID::20090326>>  
TI Methods for degrading lignocellulosic materials  
IN Vlasenko, Elena, Davis, CA, UNITED STATES  
Cherry, Joel, Davis, CA, UNITED STATES  
Xu, Feng, Davis, CA, UNITED STATES  
PA Novozymes, Inc., Davis, CA, UNITED STATES (U.S. corporation)  
PI US 7354743 B2 20080408  
AI US 2005-36871 20050114 (11)  
PRAI US 2004-537452P 20040116 (60)  
DT Utility  
FS GRANTED  
EXNAM Primary Examiner: Lilling, Herbert J.  
LREP Starnes, Robert L.  
CLMN Number of Claims: 13  
ECL Exemplary Claim: 1  
DRWN 29 Drawing Figure(s); 29 Drawing Page(s)  
LN.CNT 2914  
CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
AB The present invention relates to methods for degrading a lignocellulosic material, comprising: treating the lignocellulosic material with an effective amount of one or more cellulolytic enzymes in the presence of at least one surfactant selected from the group consisting of a secondary alcohol ethoxylate, fatty alcohol ethoxylate, nonylphenol ethoxylate, tridecyl ethoxylate, and polyoxyethylene ether, wherein the presence of the surfactant increases the degradation of lignocellulosic material compared to the absence of the surfactant. The present invention also relates to methods for producing an organic substance, comprising: (a) saccharifying a lignocellulosic material with an effective amount of one or more cellulolytic enzymes in the presence of at least one surfactant selected from the group consisting of a secondary alcohol ethoxylate, fatty alcohol ethoxylate, nonylphenol ethoxylate, tridecyl ethoxylate, and polyoxyethylene ether, wherein the presence of the surfactant increases the degradation of lignocellulosic material compared to the absence of the surfactant; (b) fermenting the saccharified lignocellulosic material of step (a) with one or more fermenting microorganisms; and (c) recovering the organic substance from the fermentation.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.



L12 ANSWER 33 OF 33 USPAT2 on STN  
 AN 2005:171309 USPAT2 <<LOGINID::20090326>>  
 TI Kluyveromyces strains metabolizing cellulosic and hemicellulosic materials  
 IN Levine, Robert Paul, Carmel Valley, CA, UNITED STATES  
 PA Phage Biotechnology, Inc., Las Vegas, NV, UNITED STATES (U.S. corporation)  
 PI US 7344876 B2 20080318  
 AI US 2004-759785 20040116 (10)  
 PRAI US 2003-442455P 20030124 (60)  
 DT Utility  
 FS GRANTED  
 EXNAM Primary Examiner: Marx, Irene  
 LREP Knobbe, Martens, Olson & Bear, LLP  
 CLMN Number of Claims: 10  
 ECL Exemplary Claim: 1  
 DRWN 7 Drawing Figure(s); 7 Drawing Page(s)  
 LN.CNT 1085  
 CAS INDEXING IS AVAILABLE FOR THIS PATENT.  
 AB This invention relates to the use of microorganisms for the generation of ethanol from lignocellulosic waste materials. Yeast strains of the genus Kluyveromyces which have the capability to ferment cellulose, hexose sugars to ethanol are provided. Also provided are methods for converting cellulose, hexoses, or mixed hydrolysates of hexoses to ethanol by fermentation with Kluyveromyces strains. The invention also provides methods to isolate yeast strains which metabolize cellulose, pentoses, or hemicelluloses from waste materials.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

=> s Obae Kazuhiro/AU  
 'AU' IS NOT A VALID FIELD CODE  
 'AU' IS NOT A VALID FIELD CODE  
 L13 30 OBAE KAZUHIRO/AU

=> s l13 and (beta(a)glucan)  
 L14 1 L13 AND (BETA(A) GLUCAN)

=> dis l14 bib abs

L14 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN  
 AN 2005:493635 CAPLUS <<LOGINID::20090326>>  
 DN 143:44035  
 TI Preparation of nonreducing  $\beta$ -glucan derivative terminated by fructofuranose  
 IN Obae, Kazuhiro; Ibuki, Ichiro; Matsui, Hirokazu; Ito, Hiroyuki; Watanabe, Kenji  
 PA Asahi Kasei Chemicals Corporation, Japan  
 SO PCT Int. Appl., 24 pp.  
 CODEN: PIXXD2  
 DT Patent  
 LA Japanese  
 FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2005052008	A1	20050609	WO 2004-JP17562	20041126
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC,				

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 NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY,  
 TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW  
 RW: BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM,  
 AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK,  
 EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LU, MC, NL, PL, PT, RO,  
 SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR,  
 NE, SN, TD, TG

EP 1690876 A1 20060816 EP 2004-819431 20041126

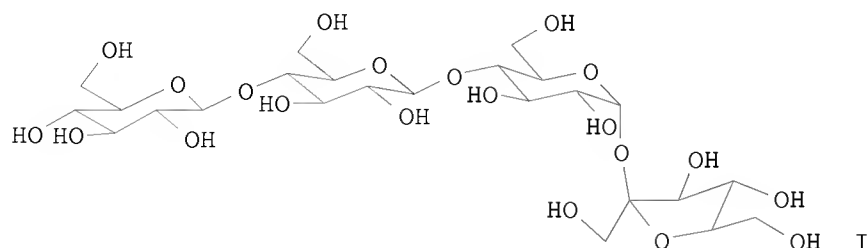
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 IE, SI, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK, IS

PRAI JP 2003-398514 A 20031128

WO 2004-JP17562 W 20041126

OS CASREACT 143:44035

GI



AB There is provided a  $\beta$ -glucan derivative comprising a  $\beta$ -glucan residue of three or more glucose residues and, chemical bonded to the  $\beta$ -glucan residue, a nonreducing sugar residue. These  $\beta$ -glucan derivs. do not readily react with active ingredients having terminal amino groups while providing excellent binding property, moldability, and degradability, and are stably formulated as binders for compns. of drugs, agrochems., fertilizers, feeds, food, cosmetics, or industrial chems. Thus, 5% sucrose, 5% cellotriose, and  $\beta$ -Fructofuranosidase of *Arthrobacter globiformis* were allowed to react at 37° for 20 h to give  $\beta$ -D-fructofuranosyl  $\alpha$ -cellobioside (I). I hardly reacted with L-arginine at 40° and 75% relative humidity for 2 wk and maintained white coloration. I (200 mg) was molded under 25 kN pressure to a cylinder mold (8 mm diameter), which exhibited the hardness of 70 N and degradation time of 58 s in pure water at 37°.  $\beta$ -Glucans having glucose residue 40, 220, 500, and 1,064 were similarly transglycosylated to give  $\beta$ -D-fructofuranosyl  $\beta$ -glucans.

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 ALL CITATIONS AVAILABLE IN THE RE FORMAT

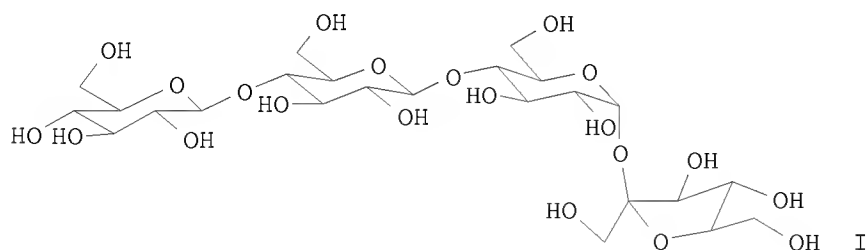
=> s Ibuki Ichiro/AU  
 'AU' IS NOT A VALID FIELD CODE  
 'AU' IS NOT A VALID FIELD CODE  
 L15 101 IBUKI ICHIRO/AU

=> s l15 and (beta(a)glucan)  
 L16 1 L15 AND (BETA(A) GLUCAN)

=> dis 116 bib abs

L16 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN  
AN 2005:493635 CAPLUS <<LOGINID::20090326>>  
DN 143:44035  
TI Preparation of nonreducing  $\beta$ -glucan derivative  
terminated by fructofuranose  
IN Obae, Kazuhiro; Ibuki, Ichiro; Matsui, Hirokazu; Ito, Hiroyuki;  
Watanabe, Kenji  
PA Asahi Kasei Chemicals Corporation, Japan  
SO PCT Int. Appl., 24 pp.  
CODEN: PIXXD2  
DT Patent  
LA Japanese  
FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2005052008	A1	20050609	WO 2004-JP17562	20041126
	W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
	RW: BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
	EP 1690876	A1	20060816	EP 2004-819431	20041126
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PRAI	JP 2003-398514	A	20031128		
	WO 2004-JP17562	W	20041126		
OS	CASREACT 143:44035				
GI					



AB There is provided a  $\beta$ -glucan derivative comprising a  $\beta$ -glucan residue of three or more glucose residues and, chemical bonded to the  $\beta$ -glucan residue, a nonreducing sugar residue. These  $\beta$ -glucan derivs. do not readily react with active ingredients having terminal amino groups while providing excellent binding property, moldability, and degradability, and are stably formulated as binders for compns. of drugs, agrochems., fertilizers, feeds, food, cosmetics, or industrial chems. Thus, 5% sucrose, 5% cellotriose, and

$\beta$ -Fructofuranosidase of *Arthrobacter globiformis* were allowed to react at 37° for 20 h to give  $\beta$ -D-fructofuranosyl  $\alpha$ -cellobioside (I). I hardly reacted with L-arginine at 40° and 75% relative humidity for 2 wk and maintained white coloration. I (200 mg) was molded under 25 kN pressure to a cylinder mold (8 mm diameter), which exhibited the hardness of 70 N and degradation time of 58 s in pure water at 37°.  $\beta$ -Glucans having glucose residue 40, 220, 500, and 1,064 were similarly transglycosylated to give  $\beta$ -D-fructofuranosyl  $\beta$ -glucans.

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

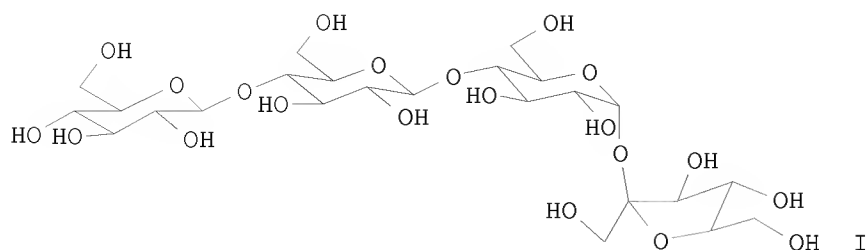
=> s Matsui Hirokazu/AU  
'AU' IS NOT A VALID FIELD CODE  
'AU' IS NOT A VALID FIELD CODE  
L17 447 MATSUI HIROKAZU/AU

=> s l17 and (beta(a)glucan)  
L18 1 L17 AND (BETA(A) GLUCAN)

=> dis l18 bib abs

L18 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN  
AN 2005:493635 CAPLUS <<LOGINID::20090326>>  
DN 143:44035  
TI Preparation of nonreducing  $\beta$ -glucan derivative  
terminated by fructofuranose  
IN Obae, Kazuhiro; Ibuki, Ichiro; Matsui, Hirokazu; Ito, Hiroyuki;  
Watanabe, Kenji  
PA Asahi Kasei Chemicals Corporation, Japan  
SO PCT Int. Appl., 24 pp.  
CODEN: PIXXD2  
DT Patent  
LA Japanese  
FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2005052008	A1	20050609	WO 2004-JP17562	20041126
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PRAI	JP 2003-398514	A	20031128		
	WO 2004-JP17562	W	20041126		
OS	CASREACT 143:44035				
GI					



AB There is provided a  $\beta$ -glucan derivative comprising a  $\beta$ -glucan residue of three or more glucose residues and, chemical bonded to the  $\beta$ -glucan residue, a nonreducing sugar residue. These  $\beta$ -glucan derivs. do not readily react with active ingredients having terminal amino groups while providing excellent binding property, moldability, and degradability, and are stably formulated as binders for compns. of drugs, agrochems., fertilizers, feeds, food, cosmetics, or industrial chems. Thus, 5% sucrose, 5% cellobiose, and  $\beta$ -Fructofuranosidase of *Arthrobacter globiformis* were allowed to react at 37° for 20 h to give  $\beta$ -D-fructofuranosyl  $\alpha$ -cellobioside (I). I hardly reacted with L-arginine at 40° and 75% relative humidity for 2 wk and maintained white coloration. I (200 mg) was molded under 25 kN pressure to a cylinder mold (8 mm diameter), which exhibited the hardness of 70 N and degradation time of 58 s in pure water at 37°.  $\beta$ -Glucans having glucose residue 40, 220, 500, and 1,064 were similarly transglycosylated to give  $\beta$ -D-fructofuranosyl  $\beta$ -glucans.

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

=> s Ito Hiroyuki/AU  
'AU' IS NOT A VALID FIELD CODE  
'AU' IS NOT A VALID FIELD CODE  
L19 2480 ITO HIROYUKI/AU

=> s l19 and (beta(a)glucan)  
L20 1 L19 AND (BETA(A) GLUCAN)

=> dis l20 bib abs

L20 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN  
AN 2005:493635 CAPLUS <<LOGINID::20090326>>  
DN 143:44035  
TI Preparation of nonreducing  $\beta$ -glucan derivative  
terminated by fructofuranose  
IN Obae, Kazuhiro; Ibuki, Ichiro; Matsui, Hirokazu; Ito, Hiroyuki;  
Watanabe, Kenji  
PA Asahi Kasei Chemicals Corporation, Japan  
SO PCT Int. Appl., 24 pp.  
CODEN: PIXXD2  
DT Patent  
LA Japanese  
FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2005052008	A1	20050609	WO 2004-JP17562	20041126

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW

RW: BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

EP 1690876 A1 20060816 EP 2004-819431 20041126

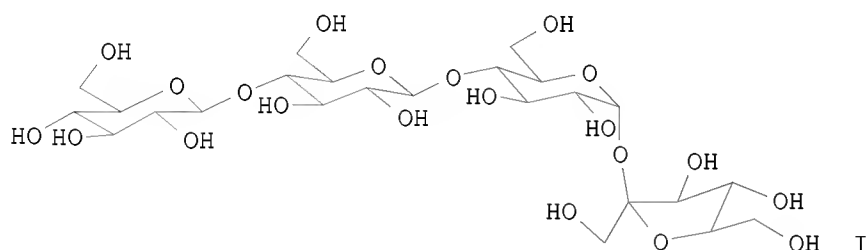
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PRAI JP 2003-398514 A 20031128

WO 2004-JP17562 W 20041126

OS CASREACT 143:44035

GI



AB There is provided a  $\beta$ -glucan derivative comprising a  $\beta$ -glucan residue of three or more glucose residues and, chemical bonded to the  $\beta$ -glucan residue, a nonreducing sugar residue. These  $\beta$ -glucan derivs. do not readily react with active ingredients having terminal amino groups while providing excellent binding property, moldability, and degradability, and are stably formulated as binders for compns. of drugs, agrochems., fertilizers, feeds, food, cosmetics, or industrial chems. Thus, 5% sucrose, 5% cellotriose, and  $\beta$ -Fructofuranosidase of *Arthrobacter globiformis* were allowed to react at 37° for 20 h to give  $\beta$ -D-fructofuranosyl  $\alpha$ -cellotrioside (I). I hardly reacted with L-arginine at 40° and 75% relative humidity for 2 wk and maintained white coloration. I (200 mg) was molded under 25 kN pressure to a cylinder mold (8 mm diameter), which exhibited the hardness of 70 N and degradation time of 58 s in pure water at 37°.  $\beta$ -Glucans having glucose residue 40, 220, 500, and 1,064 were similarly transglycosylated to give  $\beta$ -D-fructofuranosyl  $\beta$ -glucans.

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD

ALL CITATIONS AVAILABLE IN THE RE FORMAT

=> s Watanabe Kenji/AU

'AU' IS NOT A VALID FIELD CODE

'AU' IS NOT A VALID FIELD CODE

L21 3040 WATANABE KENJI/AU

=> s 121 and (beta(a)glucan)

L22 1 L21 AND (BETA(A) GLUCAN)

=> dis 122 bib abs

L22 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN

AN 2005:493635 CAPLUS <<LOGINID::20090326>>

DN 143:44035

TI Preparation of nonreducing  $\beta$ -glucan derivative  
terminated by fructofuranose

IN Obae, Kazuhiro; Ibuki, Ichiro; Matsui, Hirokazu; Ito, Hiroyuki;  
Watanabe, Kenji

PA Asahi Kasei Chemicals Corporation, Japan

SO PCT Int. Appl., 24 pp.

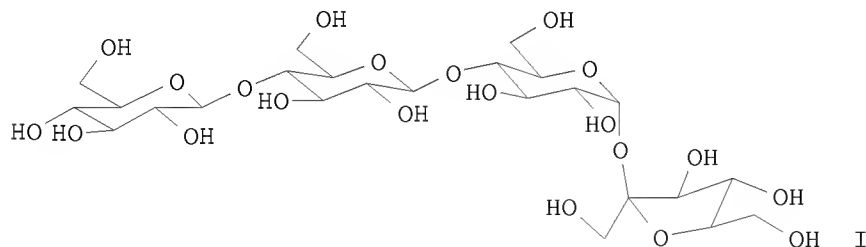
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DT Patent

LA Japanese

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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	EP 1690876	A1	20060816	EP 2004-819431	20041126
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK, IS				
PRAI	JP 2003-398514	A	20031128		
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OS	CASREACT 143:44035				
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RE.CNT 5        THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
                  ALL CITATIONS AVAILABLE IN THE RE FORMAT

=> dis hist

(FILE 'HOME' ENTERED AT 15:16:42 ON 26 MAR 2009)

FILE 'MEDLINE, EMBASE, BIOSIS, APOLLIT, BABS, CAPLUS, CBNB, CIN, COMPENDEX, DISSABS, EMA, IFIPAT, NTIS, PASCAL, PROMT, RAPRA, SCISEARCH, TEXTILETECH, USPATFULL, USPATOLD, USPAT2, WPIFV, WPINDEX, WSCA, WTEXTILES' ENTERED AT 15:17:11 ON 26 MAR 2009

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L4      622 S L3 AND SYNTHESIS
L5      522 S L4 AND OLIGO?
L6      106 S L5 AND (NON-REDUCING(A)END)
L7      31 S L6 AND (GLC OR GAL)
L8      1684 S L2 AND CELLULASE
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L11     2 S L10 AND (GLC AND GAL)
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L18     1 S L17 AND (BETA(A)GLUCAN)
L19     2480 S ITO HIROYUKI/AU
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L22     1 S L21 AND (BETA(A)GLUCAN)

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